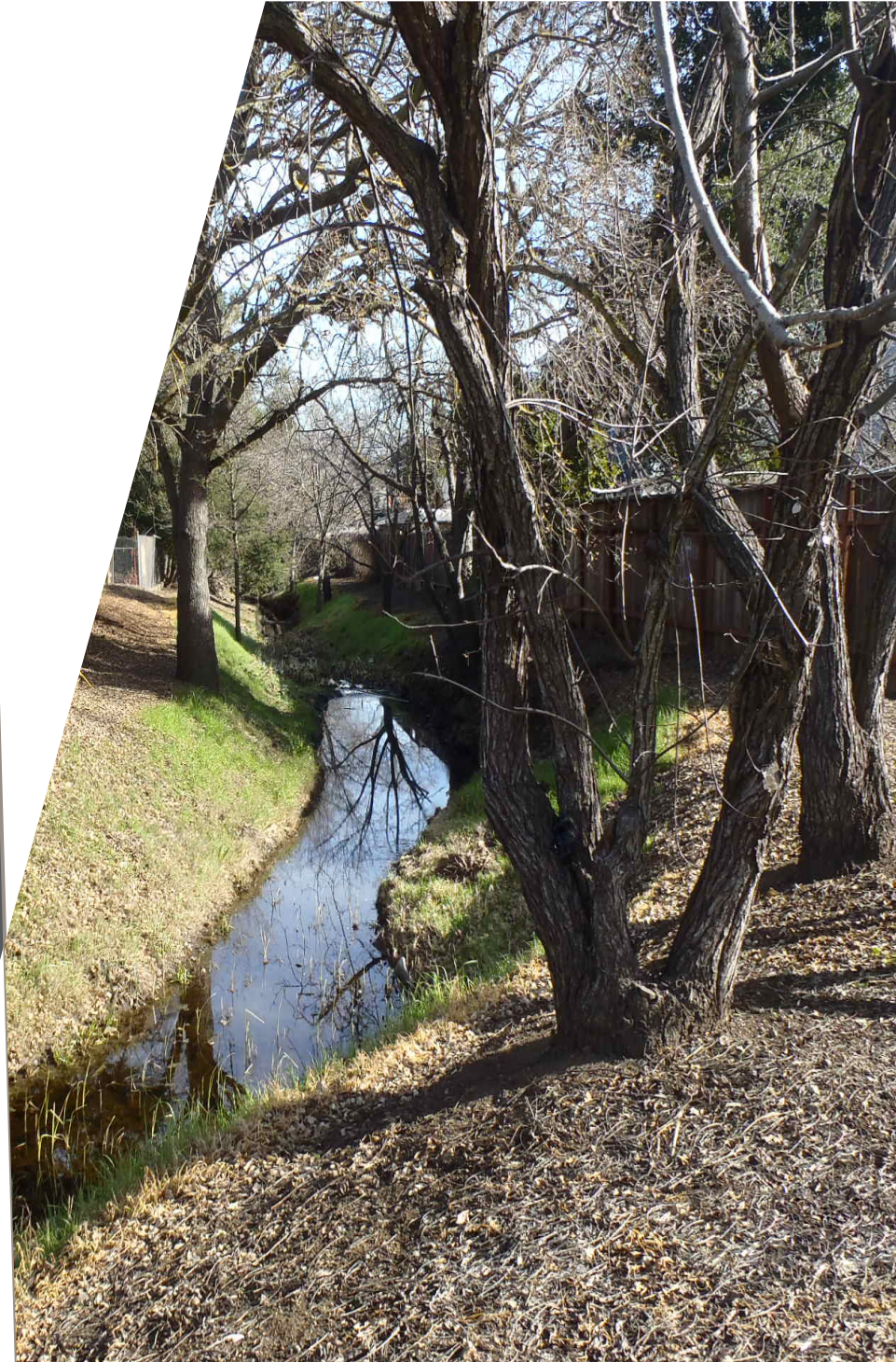


# Upper Llagas Creek Project

Environmental Impact  
Report

Final  
May 2014

State Clearinghouse  
No. 2012102032



Prepared for





## Document Information

Prepared for	Santa Clara Valley Water District
Project Name	Upper Llagas Creek Project
State Clearinghouse Number	2012102032
Project Number	30523030
Project Manager	Mitchell Katzel
Date	May 19, 2014

Prepared for:



Santa Clara Valley Water District  
5750 Almaden Expressway, San Jose, CA 95118

Prepared by:



Cardno ENTRIX  
2300 Clayton Road, Suite 200, Concord, CA 94520

This Page Intentionally Left Blank



# Table of Contents

<b>1</b>	<b>Final Environmental Impact Report (FEIR) – Revisions .....</b>	<b>1-1</b>
1.1	Summary .....	1-1
	Table S-1 Summary of Project Impacts.....	1-3
1.2	Chapter 1 Introduction .....	1-21
1.3	Chapter 2 Description of Alternatives .....	1-21
1.4	Chapter 3 Affected Environment and Environmental Consequences.....	1-23
1.4.1	Section 3.2 Hydrology and Water Quality .....	1-23
	Table 3.2-1 Existing and Proposed Project Design Flow Capacities .....	1-24
1.4.2	Section 3.3 Mineral Resources .....	1-28
1.4.3	Section 3.4 Botanical Resources .....	1-30
	Table 3.4-1 Vegetation Types and Habitats in the Study Area .....	1-31
	Table 3.4-4 Impacts to Vegetation Types and Habitats within CDFW Jurisdiction for the Preferred Alternative <sup>1,2</sup> .....	1-34
	Table 3.4-5 Permanent and Temporary Impacts to USACE and CDFW Jurisdictional Habitats for the Preferred Alternative <sup>1</sup> .....	1-35
	Table 3.4-6 Impacts to Vegetation Types and Habitats outside of CDFW Jurisdiction for the Preferred Alternative <sup>1</sup> .....	1-35
1.4.4	Section 3.5 Wildlife Resources .....	1-45
	Table 3.5-1 Special-status Wildlife Species Potentially Occurring in the Project Area .....	1-46
1.4.5	Section 3.6 Aquatic Resources .....	1-50
1.4.6	Section 3.7 Agricultural and Forest Resources .....	1-55
1.4.7	Section 3.12 Noise .....	1-56
1.4.8	Section 3.14 Utilities and Public Services .....	1-57
1.4.9	Section 3.15 Recreation Resources .....	1-57
1.4.10	Section 3.16 Population and Housing .....	1-58
1.5	Chapter 4 Other CEQA Considerations .....	1-58
1.5.1	Section 4.1.3 Cumulative Impact Discussion.....	1-58
1.6	Chapter 7 References .....	1-62
1.7	Appendix C Upper Llagas Creek Project Comprehensive BMPs .....	1-63
1.8	Appendix E Impacts to Vegetation Types and Habitats for the Tunnel (Preferred) Alternative.....	1-64
<b>2</b>	<b>Response to Comments .....</b>	<b>2-1</b>
2.1	List of Commentors .....	2-1
2.1.1	Comment Card RR.....	2-2
2.1.2	Email LH.....	2-3
2.1.3	Email DJ-I.....	2-4
2.1.4	Access Valley Water DJ-I .....	2-5
2.1.5	Email MM .....	2-6
2.1.6	Letter CDFW .....	2-7
2.1.7	Letter VTA .....	2-13

2.1.8	Letter CALTRANS.....	2-14
2.1.9	Letter NMFS.....	2-17
2.1.10	Letter CCRWQCB.....	2-20
<b>3</b>	<b>Mitigation Monitoring and Reporting Program.....</b>	<b>3-1</b>
3.1	Introduction.....	3-1
3.2	Purpose .....	3-1
3.3	Summary Project Description.....	3-1
3.4	Responsibilities and Duties .....	3-2
3.5	Mitigation Monitoring and Reporting Plan Matrix .....	3-2

## Tables

Table 2-1	Comments Received on Draft EIR.....	2-1
Table 2-2	Response to Comments .....	2-27
Table 3-1	Overview of Proposed Project Components.....	3-2
Table 3-2	Mitigation Monitoring and Reporting Program Summary Table.....	3-3

## Attachments

Attachment A Public Meeting Transcript

## Acronyms

BAAQMD	Bay Area Air Quality Management District
BMPs	Best Management Practices
BTG	Bicycle Technical Guidelines
Cal Fire	California Department of Forestry and Fire Protection
Caltrans	California Department of Transportation
CAR	Coordination Act Report
CCRWQCB	Central Coast Regional Water Quality Control Board
CDFW	California Department of Fish and Wildlife
CEQA	California Environmental Quality Act
CFR	Code of Federal Regulations
CNDDDB	California Natural Diversity Database
CNPS	California Native Plant Society
CTS	California Tiger salamander
CY	cubic yard(s)
EIR	Environmental Impact Report
FEIR	Final Environmental Impact Report
GHG	greenhouse gas

ITP	Incidental Take Permit
lbs	pounds
LWD	Large Woody Debris
MMRP	Mitigation Monitoring and Reporting Program
MND	Mitigated Negative Declaration
mph	miles per hour
NMFS	National Marine Fisheries Service
NOP	Notice of Preparation
NO <sub>x</sub>	Nitrogen oxides (NO <sub>2</sub> and NO collectively)
PFO	Riparian Forest
PM <sub>10</sub>	respirable particulate matter
PM <sub>2.5</sub>	fine particulate matter
Project	Upper Llagas Creek Project
PSS	Riparian Scrub-Shrub
RWQCB	Regional Water Quality Control Board
SCCVCD	Santa Clara County Vector Control District
SCVWD	Santa Clara Valley Water District
SMP	Stream Maintenance Program
SWPPP	Stormwater Pollution Prevention Plan
U.S. 101	U.S. Highway 101
U/H	Upland Herbaceous
U/S	Upland Schrub
UF/W	Upland Forest/Woodland
USACE	U.S. Army Corps of Engineers
USFWS	U.S. Fish and Wildlife Service
Valley HP	Santa Clara Valley Habitat Plan
WLLC-ELLC	West Little Llagas Creek-East Little Llagas Creek

This Page Intentionally Left Blank

# 1 Final Environmental Impact Report (FEIR) – Revisions

---

## 1.1 Summary

Table S-1 presents a summary and comparison of the Upper Llagas Creek Project (Project), including the Proposed Project and its alternatives. The matrix shows the affected resource areas and impact issues and summarizes impact significance and mitigation for each alternative. The focus of this Final Environmental Impact Report (FEIR) is to provide: revisions to the Draft Environmental Impact Report (EIR) (Chapter 1); to disclose comments received during the public comment period (January 6–February 20, 2014) and responses to those comments (Chapter 2); and the draft Mitigation Monitoring and Reporting Plan for construction of the Proposed Project (Chapter 3). Table S-1 shows revisions to the Project impacts and mitigations and is included as a completed comparison summary of all impacts and mitigations proposed for the Project and alternatives.



This Page Intentionally Left Blank

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>Geology and Soils</b>					
<b>GEO-1:</b> Project features could be subject to failure due to earthquake-induced liquefaction ground failures, which could diminish flood capacity and protection and/or present physical hazards to public safety	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> NI <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> GEO-1a T: Post Earthquake Inspections. GEO-1b T: Post Earthquake Tunnel Inspection.	<b>Construction</b> NI <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> GEO-1a T: Post Earthquake Inspections.	<b>Construction</b> NI <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> GEO-1a T: Post Earthquake Inspections.	<b>Construction</b> NI <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> GEO-1a T: Post Earthquake Inspections. GEO-1b T: Post Earthquake Tunnel Inspection.
<b>Hydrology and Water Quality</b>					
<b>HYDRO-1:</b> Potential to violate water quality standards	<b>Construction</b> N/A <b>Operations and Maintenance</b> S	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> S <b>Mitigation</b> None required
<b>HYDRO-2:</b> Substantially degrades water quality	<b>Construction</b> N/A <b>Operations and Maintenance</b> S	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> WILD-3c T: Development and Implementation of a Bat Monitoring Program and Development of Bat/Tunnel Exclusion Devices.	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> S <b>Mitigation</b> WILD-3c T: Development and Implementation of a Bat Monitoring Program and Development of Bat/Tunnel Exclusion Devices.
<b>HYDRO-3:</b> Creates or contributes runoff water that would exceed the capacity of existing or planned stormwater drainage systems or provides substantial additional sources of potentially impacted runoff	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required
<b>HYDRO-4:</b> Substantially depletes or interferes with groundwater supplies, groundwater recharge, or water table level	<b>Construction</b> NI <b>Operations and Maintenance</b> NI	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>HYDRO-5:</b> Alteration of drainage pattern and course of stream resulting in substantial erosion or siltation on- or off-site	<b>Construction</b> NI <b>Operations and Maintenance</b> S	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> S <b>Mitigation</b> None required
<b>HYDRO-6:</b> Alteration of drainage pattern and course of stream resulting in flooding or increased surface runoff on- or off-site. Places housing within a 100-year-flood hazard area. Places within a 100-year-flood hazard area structures that would impede or redirect flood flows, and exposes people or structures to a significant risk of loss, injury, or death involving flooding, including flooding as a result of the failure of a levee or dam.	<b>Construction</b> NI <b>Operations and Maintenance</b> S	<b>Construction</b> NI <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> B <b>Mitigation</b> None required
<b>Mineral Resources</b>					
<b>MIN-1:</b> Result in the loss of availability of a known valuable mineral resource that would be of value to the region and the residents of California	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> B <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> B <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> B <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> B <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required
<b>MIN-2:</b> Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> MIN-2 T: Inadvertent Discovery of Poppy Jasper.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> MIN-2 T: Inadvertent Discovery of Poppy Jasper.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> MIN-2 T: Inadvertent Discovery of Poppy Jasper.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> MIN-2 T: Inadvertent Discovery of Poppy Jasper.
<b>Botanical Resources</b>					
<b>BOT-1:</b> Potential for adverse effects on rare or important plant communities, and special-status plant species and their suitable habitat	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> S <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species. BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek. BOT-1e T: Dispose of Invasive Non-native Species.	<b>Construction</b> S <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species. BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek. BOT-1e T: Dispose of Invasive Non-native Species.	<b>Construction</b> S <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species. BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek. BOT-1e T: Dispose of Invasive Non-native Species.	<b>Construction</b> S <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species. BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek. BOT-1e T: Dispose of Invasive Non-native Species.

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>BOT-2:</b> Potential for adverse effects on jurisdictional wetlands, other Waters of the United States and Waters of the State	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek. BOT-1e T: Dispose of Invasive Non-native Species.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek. BOT-1e T: Dispose of Invasive Non-native Species.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek. BOT-1e T: Dispose of Invasive Non-native Species.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek. BOT-1e T: Dispose of Invasive Non-native Species.
<b>BOT-3:</b> Conflicts with local policies and/or plans	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species. BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species. BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species. BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species. BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek.
<b>Wildlife Resources</b>					
<b>WILD-1:</b> Potential for adverse effects on common and special-status nesting birds	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-1a T: Vegetation Removal during Avian Non-breeding Season.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> WILD-1a T: Vegetation Removal during Avian Non-breeding Season.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> WILD-1a T: Vegetation Removal during Avian Non-breeding Season.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-1a T: Vegetation Removal during Avian Non-breeding Season.

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>WILD-2:</b> Potential for adverse effects on special-status reptiles and amphibians, including western pond turtle and California tiger salamander	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2a T: Preconstruction Surveys for Special-status Amphibian and Reptile Species. WILD-2b T: Biological Monitor for Dewatering Activities. WILD-2c T: Relocate Special-status Species from Construction Area. WILD-2d T: Implement Compensatory Mitigation for Special-status Amphibians and Reptiles, including California tiger salamander. WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-2f T: Special-status Species Environmental Awareness Training and Construction Avoidance Measures. WILD-2g T: Bullfrog population monitoring and control at Lake Silveira. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2a T: Preconstruction Surveys for Special-status Amphibian and Reptile Species. WILD-2b T: Biological Monitor for Dewatering Activities. WILD-2c T: Relocate Special-status Species from Construction Area. WILD-2d T: Implement Compensatory Mitigation for Special-status Amphibians and Reptiles, including California tiger salamander. WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-2f T: Special-status Species Environmental Awareness Training and Construction Avoidance Measures. WILD-2g T: Bullfrog population monitoring and control at Lake Silveira. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2a T: Preconstruction Surveys for Special-status Amphibian and Reptile Species. WILD-2b T: Biological Monitor for Dewatering Activities. WILD-2c T: Relocate Special-status Species from Construction Area. WILD-2d T: Implement Compensatory Mitigation for Special-status Amphibians and Reptiles, including California tiger salamander. WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-2f T: Special-status Species Environmental Awareness Training and Construction Avoidance Measures. WILD-2g T: Bullfrog population monitoring and control at Lake Silveira. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2a T: Preconstruction Surveys for Special-status Amphibian and Reptile Species. WILD-2b T: Biological Monitor for Dewatering Activities. WILD-2c T: Relocate Special-status Species from Construction Area. WILD-2d T: Implement Compensatory Mitigation for Special-status Amphibians and Reptiles, including California tiger salamander. WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-2f T: Special-status Species Environmental Awareness Training and Construction Avoidance Measures. WILD-2g T: Bullfrog population monitoring and control at Lake Silveira. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.
<b>WILD-3:</b> Potential for adverse effects on common and special-status bats	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-3a T: Preconstruction Surveys for Common and Special-status Bats prior to Removal of Trees and Removal/Replacement of Road Culverts. WILD-3b T: Provide Alternative Bat Roost. WILD-3c T: Development and Implementation of a Bat Monitoring Program and Development of Bat/Tunnel Exclusion Devices.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-3a T: Preconstruction Surveys for Common and Special-status Bats prior to Removal of Trees and Removal/Replacement of Road Culverts. WILD-3b T: Provide Alternative Bat Roost.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-3a T: Preconstruction Surveys for Common and Special-status Bats prior to Removal of Trees and Removal/Replacement of Road Culverts. WILD-3b T: Provide Alternative Bat Roost.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-3a T: Preconstruction Surveys for Common and Special-status Bats prior to Removal of Trees and Removal/Replacement of Road Culverts. WILD-3b T: Provide Alternative Bat Roost. WILD-3c T: Development and Implementation of a Bat Monitoring Program and Development of Bat/Tunnel Exclusion Devices.



Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>WILD-4:</b> Potential for adverse effects on San Francisco dusky-footed woodrats	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-4 T: Preconstruction Surveys for San Francisco Dusky-footed Woodrat Nests prior to Vegetation Removal.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-4 T: Preconstruction Surveys for San Francisco Dusky-footed Woodrat Nests prior to Vegetation Removal.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-4 T: Preconstruction Surveys for San Francisco Dusky-footed Woodrat Nests prior to Vegetation Removal.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-4 T: Preconstruction Surveys for San Francisco Dusky-footed Woodrat Nests prior to Vegetation Removal.
<b>WILD-5:</b> Potential for adverse effects on special-status invertebrates (i.e., Opler’s longhorn moth and Bay checkerspot butterfly)	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-5a T: Conduct Plant Surveys for Host Plants of Special-status Invertebrates. WILD-5b T: Compensatory Mitigation for Impacts to Serpentine-associated Special-status Invertebrates.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-5a T: Conduct Plant Surveys for Host Plants of Special-status Invertebrates. WILD-5b T: Compensatory Mitigation for Impacts to Serpentine-associated Special-status Invertebrates.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-5a T: Conduct Plant Surveys for Host Plants of Special-status Invertebrates. WILD-5b T: Compensatory Mitigation for Impacts to Serpentine-associated Special-status Invertebrates.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-5a T: Conduct Plant Surveys for Host Plants of Special-status Invertebrates. WILD-5b T: Compensatory Mitigation for Impacts to Serpentine-associated Special-status Invertebrates.
<b>WILD-6:</b> Potential for adverse effects on migratory mammals, including San Joaquin kit fox and American badger	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-2f T: Special-status Species Environmental Awareness Training and Construction Avoidance Measures. WILD-6 T: Implementation of USFWS Standardized Recommendations for Protection of the San Joaquin Kit Fox prior to or during Ground Disturbance.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-2f T: Special-status Species Environmental Awareness Training and Construction Avoidance Measures. WILD-6 T: Implementation of USFWS Standardized Recommendations for Protection of the San Joaquin Kit Fox prior to or during Ground Disturbance.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-2f T: Special-status Species Environmental Awareness Training and Construction Avoidance Measures. WILD-6 T: Implementation of USFWS Standardized Recommendations for Protection of the San Joaquin Kit Fox prior to or during Ground Disturbance.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife. WILD-2f T: Special-status Species Environmental Awareness Training and Construction Avoidance Measures. WILD-6 T: Implementation of USFWS Standardized Recommendations for Protection of the San Joaquin Kit Fox prior to or during Ground Disturbance.

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
Aquatic Resources					
<b>AQUA-1:</b> Potential for adverse effects on upstream migration of adult S-CCC steelhead	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1a T: Steelhead Passage: Channel and Structure Design. AQUA-1b T: Steelhead Passage: Inspection of In-channel of Large Woody Debris prior to Removal for Management of Flood Conveyance Channels.	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1a T: Steelhead Passage: Channel and Structure Design. AQUA-1b T: Steelhead Passage: Inspection of In-channel of Large Woody Debris prior to Removal for Management of Flood Conveyance Channels.	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1a T: Steelhead Passage: Channel and Structure Design. AQUA-1b T: Steelhead Passage: Inspection of In-channel of Large Woody Debris prior to Removal for Management of Flood Conveyance Channels.	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1 BY: Construction of Fish Exclusion Barrier at the Downstream End of Reach 14. AQUA-1a T: Steelhead Passage: Channel and Structure Design. AQUA-1b T: Steelhead Passage: Inspection of In-channel of Large Woody Debris prior to Removal for Management of Flood Conveyance Channels.
<b>AQUA-2:</b> Potential for adverse effects on S-CCC steelhead spawning habitat usage and quality	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> <a href="#">AQUA-2a T: Preconstruction Surveys prior to In-water Construction.</a> AQUA- <del>2b</del> <sup>2</sup> T: Biological Monitor for Dewatering Activities.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> <a href="#">AQUA-2a T: Preconstruction Surveys prior to In-water Construction.</a> AQUA- <del>2b</del> <sup>2</sup> T: Biological Monitor for Dewatering Activities.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> <a href="#">AQUA-2a T: Preconstruction Surveys prior to In-water Construction.</a> AQUA- <del>2b</del> <sup>2</sup> T: Biological Monitor for Dewatering Activities.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> <a href="#">AQUA-2a T: Preconstruction Surveys prior to In-water Construction.</a> AQUA- <del>2b</del> <sup>2</sup> T: Biological Monitor for Dewatering Activities.
<b>AQUA-3:</b> Potential for adverse effects on S-CCC steelhead rearing habitat	<b>Construction</b> N/A <b>Operations and Maintenance</b> S	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1b T: Steelhead Passage: Inspection of In-channel of Large Woody Debris prior to Removal for Management of Flood Conveyance Channels. BOT-1b T: Prepare a Mitigation Plan for Special-status Plants. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1b T: Steelhead Passage: Inspection of In-channel of Large Woody Debris prior to Removal for Management of Flood Conveyance Channels. BOT-1b T: Prepare a Mitigation Plan for Special-status Plants. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1b T: Steelhead Passage: Inspection of In-channel of Large Woody Debris prior to Removal for Management of Flood Conveyance Channels. BOT-1b T: Prepare a Mitigation Plan for Special-status Plants. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1b T: Steelhead Passage: Inspection of In-channel of Large Woody Debris prior to Removal for Management of Flood Conveyance Channels. BOT-1b T: Prepare a Mitigation Plan for Special-status Plants. BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>AQUA-4:</b> Potential for adverse effects on downstream migration of juvenile S-CCC steelhead	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1a T: Steelhead Passage: Channel and Structure Design.	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1a T: Steelhead Passage: Channel and Structure Design.	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-1a T: Steelhead Passage: Channel and Structure Design.	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> AQUA-4 BY: Construction of Fish Screen and Fish Bypass Facility at the Upstream End of the Bypass Channel. AQUA-1a T: Steelhead Passage: Channel and Structure Design.
<b>AQUA-5:</b> Potential for adverse effects to aquatic species from construction and maintenance within and outside the active channel	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>Agricultural and Forest Resources</b>					
<b>AG-1:</b> Convert Prime Farmland, Unique Farmland, or Farmland of Statewide or Local Importance	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> LTSM <b>Location of Project Features</b> S <b>Operations and Maintenance</b> NI <b>Mitigation</b> AG-1a T: Agricultural Soil Amendments and Treatments. AG-1b T: Agricultural Conversion Offsets.	<b>Construction</b> LTSM <b>Location of Project Features</b> S <b>Operations and Maintenance</b> NI <b>Mitigation</b> AG-1a T: Agricultural Soil Amendments and Treatments: AG-1b T: Agricultural Conversion Offsets.	<b>Construction</b> LTSM <b>Location of Project Features</b> S <b>Operations and Maintenance</b> NI <b>Mitigation</b> AG-1a T: Agricultural Soil Amendments and Treatments: AG-1b T: Agricultural Conversion Offsets.	<b>Construction</b> LTSM <b>Location of Project Features</b> S <b>Operations and Maintenance</b> NI <b>Mitigation</b> AG-1a T: Agricultural Soil Amendments and Treatments: AG-1b T: Agricultural Conversion Offsets.
<b>AG-2:</b> Conflict with existing zoning for agricultural use, or a Williamson Act contract	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> LTSM <b>Location of Project Features</b> S <b>Operations and Maintenance</b> NI <b>Mitigation</b> AG-1a T: Agricultural Soil Amendments and Treatments. AG-2 T: Williamson Act Lands Conversion Offsets.	<b>Construction</b> LTSM <b>Location of Project Features</b> S <b>Operations and Maintenance</b> NI <b>Mitigation</b> AG-1a T: Agricultural Soil Amendments and Treatments. AG-2 T: Williamson Act Lands Conversion Offsets.	<b>Construction</b> LTSM <b>Location of Project Features</b> S <b>Operations and Maintenance</b> NI <b>Mitigation</b> AG-1a T: Agricultural Soil Amendments and Treatments. AG-2 T: Williamson Act Lands Conversion Offsets.	<b>Construction</b> LTSM <b>Location of Project Features</b> S <b>Operations and Maintenance</b> NI <b>Mitigation</b> AG-1a T: Agricultural Soil Amendments and Treatments. AG-2 T: Williamson Act Lands Conversion Offsets.

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>AG-3:</b> Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland to non-agricultural use	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> NI <b>Location of Project Features</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Location of Project Features</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Location of Project Features</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Location of Project Features</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required
<b>Land Use and Planning</b>					
<b>LAND-1:</b> Physically divide an established community	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> NI <b>Location of Project Features</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Location of Project Features</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Location of Project Features</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Location of Project Features</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required
<b>LAND-2:</b> Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the Project adopted for the purpose of avoiding or mitigating an environmental effect	<b>Construction</b> N/A <b>Operations and Maintenance</b> S	<b>Construction</b> NI <b>Location of Project Features</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> NI <b>Location of Project Features</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> NI <b>Location of Project Features</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> NI <b>Location of Project Features</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required
<b>Cultural Resources</b>					
<b>CU-1:</b> Potential for impacts to unidentified cultural and paleontological resources caused by ground disturbing activities	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>CU-2:</b> Construction impacts to known cultural resources	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> CU-2 T: Avoid Known Cultural Resources during Implementation.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> CU-2 T: Avoid Known Cultural Resources during Implementation.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> CU-2 T: Avoid Known Cultural Resources during Implementation.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> CU-2 T: Avoid Known Cultural Resources during Implementation.

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
Traffic and Circulation					
<b>TRAFFIC-1:</b> Cause an increase in traffic that is substantial in relation to the existing traffic load and capacity of the street system	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses. TRAFFIC-1 NRCS: Coordinate with Local Businesses Regarding Access.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses. TRAFFIC-1 NRCS: Coordinate with Local Businesses Regarding Access.	<b>Construction</b> S <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses.
<b>TRAFFIC-2:</b> Exceed, either individually or cumulatively, an LOS standard established by the County Congestion Management Agency for designated roads or highways	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>TRAFFIC-3:</b> Result in inadequate emergency access	<b>Construction</b> N/A <b>Operations and Maintenance</b> S	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses. TRAFFIC-1 NRCS: Coordinate with Local Businesses Regarding Access.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses. TRAFFIC-1 NRCS: Coordinate with Local Businesses Regarding Access.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses.
<b>TRAFFIC-4:</b> Conflict with adopted policies, plans, or programs supporting alternative transportation	<b>Construction</b> N/A <b>Operations and Maintenance</b> S	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>TRAFFIC-5:</b> Fail to provide safe access; obstruct access to nearby uses, including due to the loss of parking facilities; or fail to provide for future street right-of-way	<b>Construction</b> N/A <b>Operations and Maintenance</b> S	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses. TRAFFIC-5 T: Coordinate with Local Businesses Regarding Parking.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses. TRAFFIC-5 T: Coordinate with Local Businesses Regarding Parking. TRAFFIC-1 NRCS: Coordinate with Local Businesses Regarding Access.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses. TRAFFIC-5 T: Coordinate with Local Businesses Regarding Parking. TRAFFIC-1 NRCS: Coordinate with Local Businesses Regarding Access.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-1 T: Maintain Access to Local Residences and Businesses. TRAFFIC-5 T: Coordinate with Local Businesses Regarding Parking.



Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>TRAFFIC-6:</b> Potential damage to roads due to construction-generated traffic	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-6 T: Repair Local Roadways to Pre-Project Conditions.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-6 T: Repair Local Roadways to Pre-Project Conditions.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-6 T: Repair Local Roadways to Pre-Project Conditions.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> TRAFFIC-6 T: Repair Local Roadways to Pre-Project Conditions.
<b>Air Quality and Greenhouse Gases</b>					
<b>AQ-1:</b> Conflict with or obstruct implementation of the applicable Air Quality Attainment Plan or Congestion Management Plan	<b>Construction</b> NI <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>AQ-2:</b> Violate any stationary source air quality standard or contribute to an existing or projected air quality violation	<b>Construction</b> NI <b>Operations and Maintenance</b> LTS	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> AQ-2 T: Exhaust Emissions Reduction Measures.	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> AQ-2 T: Exhaust Emissions Reduction Measures.	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> AQ-2 T: Exhaust Emissions Reduction Measures.	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> AQ-2 T: Exhaust Emissions Reduction Measures.
<b>AQ-3:</b> Result in a net increase of any criteria pollutant for which the Project region is nonattainment under an applicable federal or state ambient air quality standard (including releasing emissions which exceed quantitative thresholds for ozone precursors)	<b>Construction</b> NI <b>Operations and Maintenance</b> LTS	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> AQ-2 T: Exhaust Emissions Reduction Measures.	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> AQ-2 T: Exhaust Emissions Reduction Measures.	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> AQ-2 T: Exhaust Emissions Reduction Measures.	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> AQ-2 T: Exhaust Emissions Reduction Measures.
<b>AQ-4:</b> Expose sensitive receptors to substantial pollutant concentrations	<b>Construction</b> NI <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>AQ-5:</b> Create objectionable odors affecting a substantial number of people	<b>Construction</b> NI <b>Operations and Maintenance</b> NI	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>GHG-1:</b> Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment	<b>Construction</b> NI <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>GHG-2:</b> Conflict with any applicable plan, policy, or regulation of an agency adopted for the purpose of reducing the emissions of greenhouse gases	<b>Construction</b> NI <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>Noise</b>					
<b>NOI-1:</b> Noise generation levels in excess of established standards	<b>Construction</b> N/A <b>Operations and Maintenance</b> S	<b>Construction</b> S <b>Operations and Maintenance</b> S <b>Mitigation</b> NOI-1a T: Reduce Noise from Construction and Operational Activity. NOI-1b T: Noise and Vibration Control Plan. NOI-1c T: Notify Residents of Construction Work; Implement Noise Complaint Procedure.	<b>Construction</b> S <b>Operations and Maintenance</b> S <b>Mitigation</b> NOI-1a T: Reduce Noise from Construction and Operational Activity. NOI-1b T: Noise and Vibration Control Plan. NOI-1c T: Notify Residents of Construction Work; Implement Noise Complaint Procedure.	<b>Construction</b> S <b>Operations and Maintenance</b> S <b>Mitigation</b> NOI-1a T: Reduce Noise from Construction and Operational Activity. NOI-1b T: Noise and Vibration Control Plan. NOI-1c T: Notify Residents of Construction Work; Implement Noise Complaint Procedure.	<b>Construction</b> S <b>Operations and Maintenance</b> S <b>Mitigation</b> NOI-1a T: Reduce Noise from Construction and Operational Activity. NOI-1b T: Noise and Vibration Control Plan. NOI-1c T: Notify Residents of Construction Work; Implement Noise Complaint Procedure.
<b>NOI-2:</b> Generation of excessive groundborne vibration	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> NOI-2a T: Vibration Limits. NOI-2b T: Alternate Overnight Accommodations. NOI-2c T: Notify Residents of Pile Driving Activities/Vibratory Compactor Use. NOI-2d T: Prohibit Vibratory Pile Driving within 200 feet of Residential Structures.	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> NOI-2a T: <del>Reduce Vibration from Construction Activity.</del> <u>Vibration Limits</u>	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> NOI-2a T: <del>Reduce Vibration from Construction Activity.</del> <u>Vibration Limits</u>	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> NOI-2a T: Vibration Limits. NOI-2b T: Alternate Overnight Accommodations. NOI-2c T: Notify Residents of Pile Driving Activities/Vibratory Compactor Use. NOI-2d T: Prohibit Vibratory Pile Driving within 200 feet of Residential Structures.

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>NOI-3:</b> Substantial permanent increase in ambient noise levels	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>NOI-4:</b> Substantial temporary increase in ambient noise levels	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> NOI-1a T: Reduce Noise from Construction and Operational Activity. NOI-1b T: Noise and Vibration Control Plan. NOI-1c T: Notify Residents of Construction Work; Implement Noise Complaint Procedure.	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> NOI-1a T: Reduce Noise from Construction and Operational Activity. NOI-1b T: Noise and Vibration Control Plan. NOI-1c T: Notify Residents of Construction Work; Implement Noise Complaint Procedure.	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> NOI-1a T: Reduce Noise from Construction and Operational Activity. NOI-1b T: Noise and Vibration Control Plan. NOI-1c T: Notify Residents of Construction Work; Implement Noise Complaint Procedure.	<b>Construction</b> S <b>Operations and Maintenance</b> LTS <b>Mitigation</b> NOI-1a T: Reduce Noise from Construction and Operational Activity. NOI-1b T: Noise and Vibration Control Plan. NOI-1c T: Notify Residents of Construction Work; Implement Noise Complaint Procedure.
<b>NOI-5:</b> Excessive noise levels from public airport	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>NOI-6:</b> Excessive noise levels from private airstrip	<b>Construction</b> N/A <b>Operations and Maintenance</b> NI	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required
<b>Aesthetic Resources</b>					
<b>AES-1:</b> Substantially degrade the visual character or quality of the site or surrounding area	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>AES-2:</b> Permanently and substantially obstruct or block any scenic vista or view corridor that is designated on local plans as significant or important	<b>Construction</b> N/A <b>Operations and Maintenance</b> N/A	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> NI <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required
<b>AES-3:</b> Conflict with local plans and policies on protecting visual and aesthetic resources	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTS <b>Mitigation</b> BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.
<b>AES-4:</b> Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area	<b>Construction</b> N/A <b>Operations and Maintenance</b> N/A	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> WILD-2e T: Minimize Nightwork Disruption to Wildlife.
<b>Utilities and Public Services</b>					
<b>UPS-1:</b> Disrupt utility service by damaging or displacing infrastructure	<b>Construction</b> NI <b>Operations and Maintenance</b> S	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> UPS-1a T: Well Replacement.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> UPS-1a T: Well Replacement.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> UPS-1a T: Well Replacement.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> UPS-1a T: Well Replacement.
<b>UPS-2:</b> Served by a landfill with sufficient permitted capacity to accommodate the Project's solid waste disposal needs	<b>Construction</b> NI <b>Operations and Maintenance</b> NI	<b>Construction</b> LTS <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required
<b>UPS-3:</b> Implementation of an alternative would have a significant impact on one or more of the following public services: (a) Fire protection; (b) Police protection; (c) Schools (d) Other public facilities	<b>Construction</b> NI <b>Operations and Maintenance</b> NI	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> UPS-3 T: Emergency Response Plan and Notification.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> UPS-3 T: Emergency Response Plan and Notification.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> UPS-3 T: Emergency Response Plan and Notification.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> NI <b>Mitigation</b> UPS-3 T: Emergency Response Plan and Notification.
<b>Impact 4.13:</b> Cumulative Impact to utility service by damaging or displacing infrastructure and insufficient landfill capacity		<b>Construction:</b> Less than Cumulatively Significant with Mitigation <b>Mitigation Measure UPS-1b T:</b> Emergency Response Plan Notification <b>Mitigation Measure 4.3:</b> Utility Infrastructure Upgrade Schedule Coordination		<b>Operations and Maintenance:</b> No Impact	

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
Recreation Resources					
REC-1: Disrupt access to or diminish existing recreational resources, such as parks or trails	Construction N/A Operations and Maintenance LTS	Construction LTSM Location of Project Features LTSM Operations and Maintenance LTS Mitigation REC-1a T: Trail Detour. REC-1b T: Recreational Facility Protection. REC-1c T: Public Outreach.	Construction LTSM Location of Project Features LTSM Operations and Maintenance LTS Mitigation REC-1a T: Trail Detour. REC-1b T: Recreational Facility Protection. REC-1c T: Public Outreach.	Construction LTSM Location of Project Features LTSM Operations and Maintenance LTS Mitigation REC-1a T: Trail Detour. REC-1b T: Recreational Facility Protection. REC-1c T: Public Outreach.	Construction LTSM Location of Project Features LTSM Operations and Maintenance LTS Mitigation REC-1a T: Trail Detour. REC-1b T: Recreational Facility Protection. REC-1c T: Public Outreach.
REC-2: Displace recreational users to outlying and/or other regional facilities and physically deteriorate these areas	Construction N/A Operations and Maintenance LTS	Construction LTS Location of Project Features LTS Operations and Maintenance LTS Mitigation None required	Construction LTS Location of Project Features LTS Operations and Maintenance LTS Mitigation None required	Construction LTS Location of Project Features LTS Operations and Maintenance LTS Mitigation None required	Construction LTS Location of Project Features LTS Operations and Maintenance LTS Mitigation None required
Population and Housing					
POP-1: Induce substantial population growth in an area	Construction N/A Operations and Maintenance NI	Construction NI Operations and Maintenance NI Mitigation None required	Construction NI Operations and Maintenance NI Mitigation None required	Construction NI Operations and Maintenance NI Mitigation None required	Construction NI Operations and Maintenance NI Mitigation None required
POP-2: Displace substantial numbers of existing housing and/or people	Construction N/A Operations and Maintenance NI	Construction LTS Operations and Maintenance NI Mitigation None required	Construction LTS Operations and Maintenance NI Mitigation None required	Construction LTS Operations and Maintenance NI Mitigation None required	Construction LTS Operations and Maintenance NI Mitigation None required
Socioeconomic Resources					
ECON-1: Create a housing shortage, whether by inducing population growth, depleting the housing stock, or constraining future housing development	Construction NI Operations and Maintenance NI	Construction NI Operations and Maintenance NI Mitigation None required	Construction NI Operations and Maintenance NI Mitigation None required	Construction NI Operations and Maintenance NI Mitigation None required	Construction NI Operations and Maintenance NI Mitigation None required



Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>ECON-2:</b> Result in substantial losses of real property, whether physically or by sustained diminution in value	<b>Construction</b> LTS <b>Operations and Maintenance</b> NI	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required
<b>ECON-3:</b> Substantially reduce employment or income	<b>Construction</b> LTS <b>Operations and Maintenance</b> NI	<b>Construction</b> B <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> B <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> B <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> NI <b>Mitigation</b> None required
<b>ECON-4:</b> Displace or substantially disrupt business operations	<b>Construction</b> S <b>Operations and Maintenance</b> NI	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required
<b>ECON-5:</b> Substantially reduce the supply of fiscal resources to local jurisdictions through property assessments and taxable sales	<b>Construction</b> LTS <b>Operations and Maintenance</b> NI	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> B <b>Mitigation</b> None required
<b>Hazards and Hazardous Materials</b>					
<b>HAZ-1:</b> Creation of hazard through transport, use, or disposal of hazardous material	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>HAZ-2:</b> Exposure of workers or the public to existing hazardous materials contamination	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2a T: Work Site Housekeeping Procedures. HAZ-2b T: Soil and Groundwater Management Plan. HAZ-2c T: Existing Hazardous Site Search. HAZ-2d T: Implement Recommended Phase I or Phase II Hazardous Materials Investigation and Any Required Follow-Up Remediation. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered. HAZ-2g T: Conduct Asbestos and Lead Surveys for Buildings that need to be Demolished. HAZ-2h T: Develop an Asbestos Dust Mitigation Plan and Implement other Actions Required by the BAAQMD ATCM. HAZ-2i T: Evaluation of Soil for Reuse.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2a T: Work Site Housekeeping Procedures. HAZ-2b T: Soil and Groundwater Management Plan. HAZ-2c T: Existing Hazardous Site Search. HAZ-2d T: Implement Recommended Phase I or Phase II Hazardous Materials Investigation and Any Required Follow-Up Remediation. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered. HAZ-2g T: Conduct Asbestos and Lead Surveys for Buildings that need to be Demolished. HAZ-2h T: Develop an Asbestos Dust Mitigation Plan and Implement other Actions Required by the BAAQMD ATCM. HAZ-2i T: Evaluation of Soil for Reuse.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2a T: Work Site Housekeeping Procedures. HAZ-2b T: Soil and Groundwater Management Plan. HAZ-2c T: Existing Hazardous Site Search. HAZ-2d T: Implement Recommended Phase I or Phase II Hazardous Materials Investigation and Any Required Follow-Up Remediation. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered. HAZ-2g T: Conduct Asbestos and Lead Surveys for Buildings that need to be Demolished. HAZ-2h T: Develop an Asbestos Dust Mitigation Plan and Implement other Actions Required by the BAAQMD ATCM. HAZ-2i T: Evaluation of Soil for Reuse.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2a T: Work Site Housekeeping Procedures. HAZ-2b T: Soil and Groundwater Management Plan. HAZ-2c T: Existing Hazardous Site Search. HAZ-2d T: Implement Recommended Phase I or Phase II Hazardous Materials Investigation and Any Required Follow-Up Remediation. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered. HAZ-2g T: Conduct Asbestos and Lead Surveys for Buildings that need to be Demolished. HAZ-2h T: Develop an Asbestos Dust Mitigation Plan and Implement other Actions Required by the BAAQMD ATCM. HAZ-2i T: Evaluation of Soil for Reuse.
<b>HAZ-3:</b> Generation of hazardous emissions or handling of hazardous or acutely hazardous materials, substances, or waste within 0.25 mile of an existing or proposed school	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2c T: Existing Hazardous Site Search. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered. HAZ-2h T: Develop an Asbestos Dust Mitigation Plan and Implement other Actions Required by the BAAQMD ATCM.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2c T: Existing Hazardous Site Search. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered. HAZ-2h T: Develop an Asbestos Dust Mitigation Plan and Implement other Actions Required by the BAAQMD ATCM.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2c T: Existing Hazardous Site Search. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered. HAZ-2h T: Develop an Asbestos Dust Mitigation Plan and Implement other Actions Required by the BAAQMD ATCM.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ 2c T: Existing Hazardous Site Search. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered. HAZ-2h T: Develop an Asbestos Dust Mitigation Plan and Implement other Actions Required by the BAAQMD ATCM.

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
<b>HAZ-4:</b> Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2c T: Existing Hazardous Site Search HAZ-2d T: Implement Recommended Phase I or Phase II Hazardous Materials Investigation and Any Required Follow-Up Remediation. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2c T: Existing Hazardous Site Search. HAZ-2d T: Implement Recommended Phase I or Phase II Hazardous Materials Investigation and Any Required Follow-Up Remediation. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2c T: Existing Hazardous Site Search. HAZ-2d T: Implement Recommended Phase I or Phase II Hazardous Materials Investigation and Any Required Follow-Up Remediation. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2c T: Existing Hazardous Site Search. HAZ-2d T: Implement Recommended Phase I or Phase II Hazardous Materials Investigation and Any Required Follow-Up Remediation. HAZ-2e T: Minimize the Area of Disturbance. HAZ-2f T: Stop Work and Implement Hazardous Materials Investigations and Remediation in the Event that Unknown Hazardous Materials are Encountered.
<b>HAZ-5:</b> Potential to result in safety hazard due to location within 2 miles of a public use airport	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required
<b>HAZ-6:</b> Interference with emergency response or evacuation plan	<b>Construction</b> N/A <b>Operations and Maintenance</b> S	<b>Construction</b> LTSM <b>Operations and Maintenance</b> B <b>Mitigation</b> UPS-3 T: Emergency Plan and Notification.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> B <b>Mitigation</b> UPS-3 T: Emergency Plan and Notification.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> B <b>Mitigation</b> UPS-3 T: Emergency Plan and Notification.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> B <b>Mitigation</b> UPS-3 T: Emergency Plan and Notification.
<b>HAZ-7:</b> Breeding or harborage of disease vector organisms	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2a T: Work Site Housekeeping Procedures. HAZ-7 T: Prepare and Implement a Mosquito and Vector Control Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2a T: Work Site Housekeeping Procedures. HAZ-7 T: Prepare and Implement a Mosquito and Vector Control Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2a T: Work Site Housekeeping Procedures. HAZ-7 T: Prepare and Implement a Mosquito and Vector Control Plan.	<b>Construction</b> LTSM <b>Operations and Maintenance</b> LTSM <b>Mitigation</b> HAZ-2a T: Work Site Housekeeping Procedures. HAZ-7 T: Prepare and Implement a Mosquito and Vector Control Plan.

Table S-1      Summary of Project Impacts

Environmental Resource Issue	No Project Alternative	Tunnel Alternative (Preferred Alternative)	NRCS Alternative	Culvert/Channel Alternative	Reach 6 Bypass Alternative
HAZ-8: Exposure of people or structures to risk of wildland fires	<b>Construction</b> N/A <b>Operations and Maintenance</b> LTS	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required	<b>Construction</b> LTS <b>Operations and Maintenance</b> LTS <b>Mitigation</b> None required

## 1.2 Chapter 1 Introduction

### Section 1.2 Project Purpose Objectives, Page 1-7, has been revised as follows:

The purpose of the Proposed Project is to:

- > Contain the 1-percent flood exceedance<sup>1</sup> (i.e., 100-year flood) on West Little Llagas Creek through the community of Morgan Hill;
- > Assure that no additional flooding is induced on Llagas Creek by the upstream improvements along the reaches downstream from Morgan Hill; and
- > Provide a 10-percent flood exceedance<sup>2</sup> capacity (10-year flood) on ~~East Little Llagas Creek~~ Reach 14.

## 1.3 Chapter 2 Description of Alternatives

### Section 2.4 Project Elements Common to All Action Alternatives, Page 2-40, has been revised as follows:

- > Widening (generally by constructing against one bank) and deepening the channel in all reaches (except a portion of Reach 8 under the Tunnel and Reach 6 Bypass alternatives);
- > Construct sinuous low-flow channel, with benches at bankfull elevation (except for some areas in Reach 8);
- > Permanent access roads at top of both banks in all reaches, (except for some areas in Reach 8);
- > Aquatic habitat enhancements Reaches 4, 5, 6, and 7A (except for Bypass Alternative in Reach 5 and most of Reach 6, which have no planned enhancements);
- > Grade control structures constructed of natural boulders, in all reaches;
- > Culverts at two tributary drainages where they confluence with Reach 6 and three drainages in Reach 14 to provide for maintenance access;
- > 1.25-mile-long channel on West Little Llagas Creek Reach 7A and an associated drainage swale/filter strip to collect surface runoff from surrounding agricultural land, as needed;
- > Exhume buried bridge crossings in Reach 7A at Watsonville Road and West Middle Avenue;
- > Replacing and/or modifying culverts at four road crossing locations in Reach 7B;
- > Replacing culverts in Reach 8 (culvert replacement locations vary by alternative);
- > Removal of a cinder block/brick wall that constricts flows at the Llagas Road culvert; cleaning of rocks, dirt and debris for all culverts and under the Hillwood Lane bridge in Reach 8;
- > Relocation/replacement of some homes and other structures within the Project ROW;

---

<sup>1</sup> The 1-percent flood is a flow event that statistically has a 1 percent chance of happening in any given year. It is sometimes referred to as the “100-year” flood. This is a flood that might occur once every 100 years on average over the long term.

<sup>2</sup> The 10-percent flood is a flow event that statistically has a 10 percent chance of happening in any given year. It is sometimes referred to as the “10-year” flood. This is a flood that might occur once every 10 years on average over the long term.

- > Replacement of the existing pedestrian footbridge on the private property at the corner of Llagas Creek Drive and Marianna Court;
- > Installation of a stream gage upstream of the Church Avenue percolation ponds in Reach 6;
- > Relocation/replacement of utilities within the Project construction footprint; and
- > Acquisition of fee title and easements of adjacent land needed for Project construction and maintenance.
- > Disturbed creek channels will be winterized as specified in the agency-approved project SWPPP. In addition, existing BMPs (see Section 3.2, Hydrology and Water Quality) are to manage erosion and protect from sediments entering the channel during construction and they apply throughout winter period.

**Section 2.4.1 Channel Design Features Common to All Action Alternatives, Page 2-45, has been revised as follows:**

The design flow for Reach 7A is to provide capacity for the 1-percent flood (2,090 cfs). Reach 7A would receive flows from the upstream Reach 7B at La Crosse Drive and collect runoff from adjacent agricultural fields. The downstream end of Reach 7A is the confluence with Llagas Creek just upstream of Monterey Road. This alignment and point of confluence with Llagas Creek was extensively evaluated (Noble Consultants and Northwest Hydraulics 2008) to optimize channel sediment transport through the reach; to ensure channel stability, and to thereby reduce maintenance. The Reach 7A design would include a drainage swale, filter strip, or similar design feature, to detain or otherwise re-direct surface runoff from surrounding agricultural land so that it does not directly runoff into the new channel. The drainage swale/filter strips would be incorporated, as may be appropriate, wherever ground contours might direct flow toward the new channel. The intent is to slow surface runoff, and collect sediments, nutrients, and other agricultural constituents, and thereby reduce agricultural runoff from directly entering the channel. There are no new storm drain outlets planned (there is one existing drain) through Reach 7A that would collect and deliver water directly to the channel in this reach.

**Section 2.4.5.1 Vegetation Management, Page 2-65, has been revised as follows:**

Except where specifically allowed, woody vegetation should be removed before the trunk is greater than 23 inches dbh. Over time, vegetation density may increase and flexibility of woody riparian species may decrease as the vegetation matures and becomes well established. This could cause the hydraulic roughness of the channel to increase beyond that originally designed, necessitating thinning or removal of vegetation. Vegetation management is also conducted to maintain access roads clear of vegetation, maintain the ability to visually inspect the channel, and as needed to reduce fire loads as may be required by local fire districts. Vegetation control methods include the following:

**Section 2.4.6 Lake Silveira Mitigation Element, Page 2-72, has been revised as follows:**

Portions of the 8-acre lake would be filled to create approximately 4.25 acres of emergent perennial wetlands, approximately 10.8 acres of forested habitat types including riparian and oak woodland, Sycamore forest, willow forest, and with about 3.2 acres of open water remaining of the original 8-acre lake surface. This would be accomplished by constructing a ~~hydraulically roughened open-channel~~ flow split structure (side weir) that would route ~~some of~~ the Llagas Creek flow back into the historic channel, with a portion of the flows going to the wetland, which would be created by partially filling the lake. When base flows in Llagas Creek upstream of the lake are very low, less than 3 cfs may occur in drought years, ~~most all~~ of that flow would be directed into the ~~wetlands~~ historic channel. When flows exceed 3 cfs (which is most of the time), the a portion of the flow would be directed ~~mostly~~ to the ~~historic channel~~ wetland. A lake outlet structure would be installed where the lake ties back into Llagas Creek. The outlet structure would be a weir gate, which would include a grade control structure at or downstream of the lake outlet to

prevent incision and destabilization of the bank. The outlet structure would ~~temporarily~~ have a means to control lake elevations; so that if there is settlement of the wetland surface after construction, the water elevation can be adjusted to optimize the wetland viability and function. It is expected that over the long-term, the permanent outlet structure would not need to be adjustable and that the seasonal water surface elevation in the wetland is expected to only fluctuate within a range of about 0.5 foot.

**Section 2.5.1 NRCS Alternative Features, Reach 7A, Page 2-80, has been revised as follows:**

The design flow for Reach 7A is to provide capacity for 2,090 cfs. The alignment, shape, and dimensions of the channel are described above in Section 2.4.1. The Reach 7A design would include a drainage swale, filter strip, or similar design feature, to detain or otherwise re-direct surface runoff from surrounding agricultural land so that it does not directly runoff into the new channel.

## **1.4 Chapter 3 Affected Environment and Environmental Consequences**

### **1.4.1 Section 3.2 Hydrology and Water Quality**

**Section 3.2.2.1 Environmental Setting, Surface Hydrology, Page 3.2-3, has been revised as follows:**

There is currently no channel in Reach 7A. All of the action alternatives would include the construction of a ~~bypass~~ diversion channel in Reach 7A, which would carry all of the flow formerly in West Little Llagas Creek to East Little Llagas Creek and route it through the bypass channel to the Llagas Creek channel just downstream from Lake Silveira near Monterey Highway. Also, maintenance roads would be constructed along Reach 7A. ~~This~~ The new channel will decrease flow in East Little Llagas Creek and increase the discharge magnitude routed to Llagas Creek through Reaches 6, 5, and 4. These reaches would be widened and deepened to accommodate the additional flow magnitude, so that there is no new flooding induced by the channel capacity improvements in the upstream reaches. The SCVWD diverts a portion of the flow from Reach 6 to the Church ~~Street~~ Avenue percolation ponds for groundwater recharge. Reaches 5 and 4 are an intermittently flowing channel as the perennial flow in Reach 6 dissipates and percolates to groundwater. East Little Llagas Creek (i.e., Reach 14), which was deepened and channelized several decades ago for construction of U.S. 101, is also an intermittently flowing channel. A reach-by-reach summary description of the stream channels and the Project features common to all of the action alternatives is provided in Sections 2.1 and 2.4, respectively.

**Section 3.2.2.2 Groundwater, Table 3.2-1, Page 3.2-4, has been revised as follows:**

**Table 3.2-1 Existing and Proposed Project Design Flow Capacities**

Location	Reach Description		Existing Channel Capacity in Reach				With Project Peak Discharge <sup>1</sup> (cfs)		Design Capacity (cfs)	Design Return Period
			Discharge (cfs) <sup>2</sup>		Approximate Return Period <sup>3</sup>					
	From	To	Min	Max	Min	Max	10-yr	100-yr		
Reach 4	E. Little Llagas Ck.	Masten Ave.	2,200	3,400	<2-yr	5-yr	6,790	11,830	6,790	<del>10-yr</del> No induced flooding
	Masten Ave.	Rucker Ave.	2,200	7,000	<2-yr	25-yr	6,790	11,830	6,790	<del>10-yr</del> No induced flooding
	Rucker Ave.	Buena Vista Ave.	2,200	9,500	<2-yr	25-yr	6,790	11,830	6,790	<del>10-yr</del> No induced flooding
Reach 5	U.S. 101	E. Little Llagas Ck.	2,700	>2,800	<5-yr	>5-yr	3,280	5,780	3,280	<del>10-yr</del> No induced flooding
Reach 6	Silveira Lake	U.S. 101	1,300	>2,800	2-yr	>5-yr	2,990	5,540	2,990	<del>10-yr</del> No induced flooding
	U/S Silveira Lake	Silveira Lake	3,000	6,200	25-yr	>100-yr	1,930	4,860	--	--
Reach 7A	La Crosse Dr.	Llagas Ck.	n/a	n/a	n/a	n/a	1,360	2,100	2,100	100-yr
Reach 7B	W. Dunne Ave.	Ciolino Ave.	--	300	--	<2-yr	720	1,130	1,130	100-yr
	Ciolino Ave.	Spring Ave.	200	650	<2-yr	4-yr	950	1,490	1,490	100-yr
	Spring Ave.	La Crosse Dr.	<410	1,700	<2-yr	>100-yr	1,050	1,580	1,580	100-yr
	W. Little Llagas near La Crosse Dr. (cut-off channel section)	West Little Llagas Ck at UPRR						110	<sup>4</sup>	4
	West Little Llagas Ck at UPRR	West Little Llagas at U.S. 101, before Madrone Channel						870	<sup>4</sup>	4



**Table 3.2-1 Existing and Proposed Project Design Flow Capacities**

Location	Reach Description		Existing Channel Capacity in Reach				With Project Peak Discharge <sup>1</sup> (cfs)		Design Capacity (cfs)	Design Return Period
			Discharge (cfs) <sup>2</sup>		Approximate Return Period <sup>3</sup>					
	From	To	Min	Max	Min	Max	10-yr	100-yr		
Reach 8	W. Main Ave.	W. 5th St.	<260	260	<2-yr	<2-yr	630	990	990	100-yr
	W. 5th St.	W. Dunne Ave.	<320	320	<2-yr	<2-yr	720	1,130	1,130	100-yr
Reach 14	Madrone Channel	Corralitos Ck.	1,200	<del>2,100</del> 21,000	5-yr	>100-yr	1,570	2,160	1,570	10-yr
	Corralitos Ck.	San Martin Ck.	1,700	3,000	5-yr	25-yr	2,540	4,060	2,540	10-yr
	San Martin Ck.	Church Ck.	2,300	3,000	5-yr	< 10-yr	3,150	5,140	3,150	10-yr
	Church Ck.	Llagas Ck.	2,300	2,300	5-yr	5-yr	3,450	5,780	3,450	10-yr

<sup>1</sup> 10-yr and 100-yr Peak Discharges from USACE Llagas Creek Flood Control Project Hydrologic Investigation, rounded.

<sup>2</sup> Based on Hydrologic Engineering Center - River Analysis System (HEC-RAS) models for Existing Llagas Creek (i.e., discharge not in overbank areas. Actual channel capacity will vary.) USACE estimates existing Reach 8 capacity = 300 cfs.

<sup>3</sup> Relative to estimated Project peak discharge.

<sup>4</sup> The cut-off West to East Little Llagas Creek channel segment would not have a design capacity since there would be no improvement work in this channel segment. The flow capacity would remain the same as existing conditions.

**Section 3.2.2.3 Water Quality, Page 3.2-7, has been revised as follows:**

~~Four-Three~~ pollutants (fecal coliform, nitrates [nutrients], ~~and~~ sedimentation/siltation, ~~and total dissolved solids~~) ~~that~~ are currently listed on the Clean Water Act (CWA) Section 303 (d) list; ~~and have established TMDLs. have been established by the EPA for nitrates (nutrients) and sedimentation.~~

- > The TMDL for nutrients, including nitrates, in the Pajaro River and Llagas Creek is set at a maximum of 10 milligrams per Liter (mg/L) measured as Nitrogen in receiving waters (~~Final Regional SWMP~~CRWQCB 2010).
- > The TMDL for sedimentation/siltation in Llagas Creek is based on suspended sediment, and is provided in Table 3.2-4.
- > The TMDL for fecal coliform (established in 2011, as detailed in the Basin Plan for the protection of the beneficial use of water contact recreation) is based on a minimum of not less than five samples for any 30-day period, and shall not exceed a log mean of 200 Most Probable Number (MPN) per 100 milliliter (mL), nor shall more than 10 percent of samples collected during any 30-day period exceed 400 MPN per 100 mL.

Llagas Creek is listed on the CWA Section 303 (d) list for chloride and sodium, but TMDLs for each pollutant have yet to be established.

High levels of chloride and sodium have been detected on Llagas Creek downstream of the confluence with Miller Slough on an approximately 1-mile-long section of stream near Southside Drive. However, Southside Drive is roughly 7 miles downstream of Reach 4 and outside of the Project footprint. ~~Llagas Creek is listed on the CWA Section 303 (d) list for chloride and sodium, but TMDLs for each pollutant have yet to be established.~~ Other pollutants and impairment parameters ~~without specified locations on Llagas Creek are also~~ listed on the Section 303 (d) list. ~~These include~~ for Llagas Creek below Chesbro Reservoir are chlorpyrifos, electrical conductivity, *E. coli*, low dissolved oxygen (DO), and turbidity. For these parameters TMDLs have yet to be established.

- > Chlorpyrifos is a pesticide used in both home and agricultural applications.
- > Electrical conductivity measures the ability of water to pass an electrical current and is an indicator parameter that increases with increasing levels of chloride and sodium mentioned above, as well as other salts and dissolved metals.
- > *E. coli* is a type of fecal coliform for which Llagas Creek is known to be impaired between the confluence with Church Creek and the confluence with the Pajaro River. Sources of *E. coli* include pasture grazing, as well as other nonpoint and natural sources.

As discussed further below, turbidity and low DO in Llagas Creek are a result of a number of factors. Sources of these more general area impairments range from unknown to agricultural and municipal, as well as habitat modification and TMDLs have yet to be established.

**Section 3.2.3.2 State, Central Coastal Basin Water Quality Control Plan, Page 3.2-11, has been revised as follows:**

The Basin Plan is maintained by the Central Coast RWQCB and details present and potential beneficial uses of basin surface waters and sets water quality objectives for controllable water quality conditions. The AntiDegradation Policy (Chapter 3, Section IIA of the plan) details general objectives for all inland surface waters of the basin including targets for suspended and settleable materials, sediment, turbidity, DO, and toxins. The ~~State i~~ Implementation plan ([SIP] Chapter 4 of the plan) establishes TMDLs for impairments by specific hydrologic unit and subwatershed (see Section 3.2.2.3 for definition of TMDLs). ~~The TMDL for sediment in Llagas Creek are presented in Table 3.2-4, above. The TMDL for fecal coliform~~

~~is limited to one of two allocations.~~ Erosion and sedimentation controls are detailed in approved area-wide BMPs. Some of the relevant Central Coast Region Basin Plan water quality objectives and criteria are as follows:

**Section 3.2.4.2 Approach and Analysis, Page 3.2-17, has been revised as follows:**

The first three significance criteria listed in Section 3.2.4.1 are all closely related to the degradation of water quality. Therefore, we address each of those three significance criteria as one common group. The Basin Plan outlines water quality standards and TMDLs for Llagas Creek as discussed in Section 3.2.2.3. RWQCB approved erosion and sedimentation controls are detailed in approved area-wide BMPs, which are identified within the Regional SWMP and described in the SCVWD, BMP Handbook, Revision A, May 22, 2008. These BMPs are intended to minimize degradation of water quality to levels set forth in the Basin Water Quality Control Plan related to DO, turbidity, sedimentation, ~~and nitrates,~~ and other identified impairments of Llagas Creek that do not yet have TMDLs. Additionally, a Project SWPPP to be prepared in accordance with the CGP will contain additional BMPs intended to protect water quality during Project construction.

The effect of the Lake Silveira mitigation element on temperatures and DO conditions is not addressed in Section 3.2, Hydrology and Water Quality, but is addressed in Section 3.6, Aquatics Resources, because of the important connection of these water quality parameters to steelhead growth and survival. However, it is noted here that the proposed restoration of flow into the formerly abandoned Llagas Creek channel around Lake Silveira; and the creation of wetland habitat represents a net benefit to water quality to the downstream Project reaches by reducing high water temperatures, improving DO, and providing a wetlands sink for nutrients such as nitrogen and phosphorus, and filtering of sediments resulting in reduced water quality concentrations of other impairments of Llagas Creek. As such, water quality during stormflow runoff through the Lake Silveira project element would be improved and this is a beneficial effect of the Project.

None of the Project alternatives would result in waste, nutrient (nitrate), pesticide (chlorpyrifos), or pathogen (fecal coliform, *E. coli*) discharges. Although the new channel along Reach 7A crosses through agricultural land that could provide impacted runoff from pesticides, herbicides, nitrates or other agricultural chemicals, the final design plans and specifications will include drainage swales, berms and/or similar features where appropriate along Reach 7A to minimize this potential impact to beneficial uses of Llagas Creek.

Project-related changes to water quality, besides the beneficial effects described above, include ~~There are no waste or nutrient discharges related to any of the Project alternatives; however there are Project-related~~ the effects related to changes to the existing stormwater drainage systems. Eliminating over-bank flows during floods through Morgan Hill (Reaches 8 and 7B, including the cut-off portion of West Little Llagas Creek), the potential to entrain sediments and carry pollutants from urban and agricultural lands on the floodplain, which then drain back into the channel, would be substantially reduced, improving water quality. By reducing over-bank flows and the associated sediment load, concentrations of nutrients, pesticides (chlorpyrifos for example), herbicides, fecal coliform, *E. coli*, turbidity, and other identified impairments of Llagas Creek would be reduced.

Although operational activities do not contribute any additional runoff, all of the action alternatives would bypass flow from the existing West Little Llagas Creek channel through a newly constructed channel in Reach 7A that would add runoff to the downstream Llagas Creek Reaches 4, 5, and 6. However, this is not an impact on the capacity of the stormwater drainage system. This is because the Project design fundamentally includes an increase in the flood capacity of these downstream reaches so that there is no induced flooding due to upstream project improvements. Additionally, as discussed above, the downstream reaches are dimensioned so that they are hydraulically stable under the new flow conditions. As such, there is no operational impact to the stormwater drainage system. Vegetation management, sediment management, and minor maintenance activities are proposed and conducted only to maintain

the flood capacity of the channels under all of the action alternatives. Consequently, maintenance activities do not add to runoff, rather maintenance ensures that the channels function efficiently to handle the runoff and maintain the hydraulic capacity of the channel design.

Excavation to deepen and widen existing stream channels and to create a new bypass channel (Reach 7A) could potentially intercept local groundwater as indicated by stream side well elevations, and recent piezometer readings and pump tests specifically pertinent to Reach 7A (see Section 3.2.2.2 above for description of existing groundwater conditions). An analysis is provided for each alternative for the potential to substantially lower the groundwater table, along West Little Llagas, East Little Llagas, and Llagas Creek in the Project design. The analysis considers the extent, to which excavation will deepen the channel in relationship to expected groundwater levels, describes the extent to which groundwater elevations could be lowered and considers the potential for groundwater lowering to affect adjacent riparian vegetation.

Through the implementation of SWPPP BMPs, the action alternatives would not directly contribute substantial sources of potentially impacted runoff during construction. Operation of the Project under all Project alternatives due to the planned stable channel design would reduce ongoing channel incision and bank erosion and, thereby, improve water quality and reduce sedimentation and siltation impairment, helping to achieve the TMDL targets in Llagas Creek and the Pajaro River.

#### 1.4.2 Section 3.3 Mineral Resources

**Section 3.3.5.2 Tunnel Alternative (Preferred Alternative), MIN-1 T—Result in the loss of availability of a known valuable mineral resource that would be of value to the region and the residents of California, Operations and Maintenance, Page 3.3-6, has been revised as follows:**

Operations and maintenance would consist of maintenance activities described in Section 2.6.5. Operations and maintenance does not involve any excavation, grading, or other earth-moving activities. Consequently, there is no opportunity for operations and maintenance to cause the loss of a known valuable mineral resource. ~~Due to the proximity of urban areas, rural residences, and significant aquatic habitat (Section 3.6, Aquatic Resources), these areas have limited or no accessibility for mining operations and would likely render such operations infeasible in accordance with the Santa Clara County General Plan criteria.~~ Operations and maintenance of the Project would, therefore, result in no impact to mineral ~~accessibility~~ availability.

**Section 3.3.5.2 Tunnel Alternative (Preferred Alternative), MIN-2 T—Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan, Page 3.3-6, has been revised as follows:**

**MIN-2 T—Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan**

**Impact Determination:** less than significant with mitigation

Project Activity	Construction Impact Level	Operation/Maintenance Impact Level
Channel excavation	<del>LTSM</del> <u>LSTM</u>	NI

NI = no impact; S = significant; LTS = less than significant; LTSM = less than significant with mitigation; B = beneficial; N/A = not applicable

**Section 3.3.5.3 Natural Resources Conservation Service (NRCS) Alternative, MIN-1 NRCS—Result in the loss of availability of a known valuable mineral resource that would be of value to the region and the residents of California, Operations and Maintenance, Page 3.3-7, has been revised as follows:**

Operations and maintenance would consist of maintenance activities described in Section 2.5.5. Operations and maintenance does not involve any excavation, grading, or other earth-moving activities. Consequently, there is no opportunity for operations and maintenance to cause the loss of a known valuable mineral resource. ~~Due to the proximity of urban areas, rural residences, and significant aquatic habitat (Section 3.6, Aquatic Resources), these areas have limited or no accessibility for mining operations and would likely render such operations infeasible in accordance with the Santa Clara County General Plan criteria.~~ Operations and maintenance of the Project would, therefore, result in no impact to mineral ~~accessibility~~ availability.

**Section 3.3.5.3 Natural Resources Conservation Service (NRCS) Alternative, MIN-2 NRCS—Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan, Page 3.3-8, has been revised as follows:**

**MIN-2 NRCS—Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan**

**Impact Determination:** less than significant with mitigation

Project Activity	Construction Impact Level	Operation/Maintenance Impact Level
Channel excavation	<del>LTS</del> <u>LSTM</u>	NI

NI = no impact; S = significant; LTS = less than significant; LSTM = less than significant with mitigation; B = beneficial; N/A = not applicable

**Section 3.3.5.4 Culvert/Channel Alternative, MIN-1 CC—Result in the loss of availability of a known valuable mineral resource that would be of value to the region and the residents of California, Operations and Maintenance, Page 3.3-7, has been revised as follows:**

Operations and maintenance would consist of maintenance activities described in Section 2.7.5. Operations and maintenance does not involve any excavation, grading, or other earth-moving activities. Consequently, there is no opportunity for operations and maintenance to cause the loss of a known valuable mineral resource. ~~Due to the proximity of urban areas, rural residences, and significant aquatic habitat (Section 3.6, Aquatic Resources), these areas have limited or no accessibility for mining operations and would likely render such operations infeasible in accordance with the Santa Clara County General Plan criteria.~~ Operations and maintenance of the Project would, therefore, result in no impact to mineral ~~accessibility~~ availability.

**Section 3.3.5.5 Reach 6 Bypass Alternative, MIN-1 BY—Result in the loss of availability of a known valuable mineral resource that would be of value to the region and the residents of California, Operations and Maintenance, Page 3.3-11, has been revised as follows:**

Operations and maintenance would consist of maintenance activities described in Section 2.8.5. Operations and maintenance does not involve any excavation, grading, or other earth-moving activities. Consequently, there is no opportunity for operations and maintenance to cause the loss of a known valuable mineral resource. ~~Due to the proximity of urban areas, rural residences, and significant aquatic habitat (Section 3.6, Aquatic Resources), these areas have limited or no accessibility for mining~~

~~operations and would likely render such operations infeasible in accordance with the Santa Clara County General Plan criteria.~~ Operations and maintenance of the Project would, therefore, result in no impact to mineral ~~accessibility~~availability.

~~Due to the proximity of urban areas, rural residences, and significant aquatic habitat (Section 3.6, Aquatic Resources), these areas have limited or no accessibility for mining operations and would likely render such operations infeasible in accordance with the Santa Clara County General Plan criteria; therefore, there would be no impact.~~

**Section 3.3.5.5 Reach 6 Bypass Alternative, MIN-2 BY—Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan, Page 3.3-11, has been revised as follows:**

**MIN-2 BY—Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan**

**Impact Determination:** less than significant with mitigation

Project Activity	Construction Impact Level	Operation/Maintenance Impact Level
Channel excavation	<del>LTS</del> <u>LTSM</u>	NI

NI = no impact; S = significant; LTS = less than significant; LTSM = less than significant with mitigation; B = beneficial; N/A = not applicable

### 1.4.3 Section 3.4 Botanical Resources

**Section 3.4.2.1 Environmental Setting, Reaches 7A and 7B, Table 3.4-1, Pages 3.4-7 and 3.4-8, has been revised as follows:**

*In response to comment CDFW-13, changes have been made to Table 3.4-6, which necessitated changes to Table 3.4-1 as well. Table 3.4-6 has been revised to indicate the forested areas outside of the CDFW jurisdiction are not riparian. The forested and scrub-shrub areas outside the California Department of Fish and Wildlife (CDFW) boundary were inadvertently mis-categorized as riparian. Vegetation mapping has been revised to show two new vegetation categories: “Upland Forest/Woodland” (UF/W) consists of scattered individual trees and “Upland Scrub” (U/S), which consists of uncommon patches of coyote brush (*Baccharis pilularis*) and many non-native shrubs. Table 3.4-6 was also revised to more accurately reflect where clearing and grading will occur, as some locales were determined not to be situated within clearing and grading zones and thus vegetation would not be impacted. In addition, a minor correction was made to address a few overlapping vegetation polygons so that total impacts were not double counted. These changes are also reflected in Table 3.4-1. Please see response to comment CDFW-13 in Section 2 of this FEIR for a complete explanation.*

**Table 3.4-1 Vegetation Types and Habitats in the Study Area**

Vegetation Type	Study Area Total (Acres)
<b>Reach 4</b>	
Riparian Forest (PFO) (native and non-native)	<del>17.5</del> <u>13.8</u>
Riparian Scrub-shrub (PSS) (native and non-native)	<del>2.9</del> <u>2.8</u>
Perennial Marsh (PEM)	--
<u>Upland Forest/Woodland (UF/W)</u>	<u>1.7</u>
Upland Herbaceous (U/H)	<del>41.1</del> <u>42.9</u>
Aquatic	7.9
Developed	1.2
<b>Reach 5</b>	
Riparian Forest (PFO) (native and non-native)	<del>1.8</del> <u>1.3</u>
Riparian Scrub-shrub (PSS) (native and non-native)	2.1
Perennial Marsh (PEM)	--
Upland Herbaceous (U/H)	<del>13.7</del> <u>14.0</u>
<u>Upland Forest/Woodland (UF/W)</u>	<u>0.2</u>
Aquatic	1.9
Developed	0.9
<b>Reach 6</b>	
Riparian Forest (PFO) (native and non-native)	<del>12.9</del> <u>11.0</u>
Riparian Scrub-shrub (PSS) (native and non-native)	<del>11.1</del> <u>10.8</u>
Perennial Marsh (PEM)	1.0
<u>Upland Forest/Woodland (UF/W)</u>	<u>0.8</u>
Upland Herbaceous (U/H)	<del>49.7</del> <u>45.9</u>
<u>Upland Scrub (U/S)</u>	<u>0.1</u>
Aquatic	8.5
Developed	<del>9.3</del> <u>7.0</u>
<b>Reach 7A</b>	
Riparian Forest (PFO) (native and non-native)	<del>3.9</del> <u>3.7</u>
Riparian Scrub-shrub (PSS) (native and non-native)	3.3
Perennial Marsh (PEM)	1.7
<u>Upland Forest/Woodland (UF/W)</u>	<u>0.2</u>

**Table 3.4-1 Vegetation Types and Habitats in the Study Area**

Vegetation Type	Study Area Total (Acres)
Upland Herbaceous (U/H)	<del>43.2</del> <u>43.1</u>
Aquatic	0.1
Developed	1.3
<b>Reach 7B</b>	
Riparian Forest (PFO) (native and non-native)	<del>1.4</del> <u>1.1</u>
Riparian Scrub-shrub (PSS) (native and non-native)	<del>0.4</del> <u>0.0</u>
Perennial Marsh (PEM)	<del>1.6</del> <u>1.9</u>
<u>Upland Forest/Woodland (UF/W)</u>	<u>0.4</u>
Upland Herbaceous (U/H)	<del>13.7</del> <u>16.4</u>
<u>Upland Scrub (U/S)</u>	<u>0.1</u>
Aquatic	<del>0.3</del> <u>0.4</u>
Developed	<del>3.1</del> <u>2.9</u>
<b>Reach 8</b>	
Riparian Forest (PFO) (native and non-native)	<del>3.4</del> <u>0.4</u>
Riparian Scrub-shrub (PSS) (native and non-native)	<del>0.9</del> <u>0.0</u>
Perennial Marsh (PEM)	<del>1.3</del> <u>0.4</u>
<u>Upland Forest/Woodland (UF/W)</u>	<u>0.3</u>
Upland Herbaceous (U/H)	<del>10.2</del> <u>4.6</u>
Aquatic	<del>0.4</del> <u>0.1</u>
Developed	<del>4.1</del> <u>2.5</u>
<b>Reach 14</b>	
Riparian Forest (PFO) (native and non-native)	<del>1.4</del> <u>0.2</u>
Riparian Scrub-shrub (PSS) (native and non-native)	2.7
Perennial Marsh (PEM)	<del>0.3</del> <u>0.2</u>
<u>Upland Forest/Woodland (UF/W)</u>	<u>1.0</u>
Upland Herbaceous (U/H)	<del>28.6</del> <u>27.7</u>
Aquatic	<del>13.4</del> <u>13.2</u>
Developed	<del>11.0</del> <u>10.1</u>



**Section 3.4.2.5 Special-status Plant Species, Pages 3.4-18 and 3.4-19, has been revised as follows:**

***Big-scale balsamroot (Balsamorhiza macrolepis)***

Big-scale balsamroot (*Balsamorhiza macrolepis*) is an RPR 1B species (CDFW 2012) [and a CNPS listing of 1B.2 \(CNPS 2014\)](#). This species is a perennial herb that occurs in chaparral, cismontane woodland, valley, and foothill grassland, and sometimes serpentine soils, at elevations between 90 and 1,555 meters (300 to 5,100 feet). Big-scale balsamroot is in the sunflower family (*Asteraceae*) and blooms from March to June.

This species may occur in the study area in grasslands or in various woodland habitats; although, no serpentine soils are present in the study area. There is one CNDDDB (CDFW 2012) occurrence of this species within 10 miles of study area. This 1990 occurrence is approximately 2.6 miles northeast of the study area, west of Coyote Dam on SCVWD property (Figure 3.4-1).

***Fragrant Fritillary (Fritillaria liliacea)***

Fragrant fritillary (*Fritillaria liliacea*) is an RPR 1B species (CDFW 2012) [and a CNPS listing of 1B.2 \(CNPS 2014\)](#). This lily occurs in grasslands, coastal scrub, and coastal prairie on various soils that are often serpentine and sometimes heavy clay, at elevations from 3 to 410 meters (10 to 1,350 feet). It flowers from February to April.

Fragrant fritillary may occur in the study area in Grassland or woodland habitats. Serpentine soils are not present in the study area, but clay soils are present. There are five CNDDDB (CDFW 2012) occurrences of fragrant fritillary within a 10-mile radius from the study area. These records range from 6.1 to 6.8 miles from the Project area. The closest occurrence is a 1989 record of 150 plants on private land in the East Santa Clara Valley, southeast of Metcalfe Canyon.

***Loma Prieta hoita (Hoita strobilina)***

Loma Prieta hoita (*Hoita strobilina*) is an RPR 1B species (CDFW 2012) [and a CNPS listing of 1B.1 \(CNPS 2014\)](#). This species usually occurs on serpentine, moist sites in cismontane woodland, riparian woodland, and chaparral, between 30 to 860 meters (100 to 2,825 feet) in elevation. Its primary habitat is woodland, especially in the understory of riparian woodlands or shaded slopes, and its secondary habitat is chaparral (ICF 2012). Although Loma Prieta hoita can inhabit non-serpentine soils, it is often associated with serpentine soils (Safford et al. 2005). It is a perennial herb in the legume family (*Fabaceae*) that blooms from May to July.

Loma Prieta hoita may occur in the study area in riparian woodlands and other woodland habitats; although, serpentine soils are not present in the study area. There are 12 CNDDDB (CDFW 2012) records of this species within 10 miles of the study area. The closest CNDDDB occurrence is approximately 1.7 miles south of the Project area that is broadly mapped in Gilroy and is a historic record from 1918 that is possibly extirpated, but other records within 10 miles are believed extant.

***Arcuate bush-mallow (Malacothamnus arcuatus) [Malacothamnus fasciculatus]***

Arcuate bush-mallow (*Malacothamnus arcuatus*) [*Malacothamnus fasciculatus*] is an RPR 1B species (CDFW 2012) [and a CNPS listing of 1B.2 \(CNPS 2014\)](#). It occurs on gravelly soils and alluvium in chaparral and cismontane woodland at elevations between 15 to 355 meters (15 to 1,165 feet). This species is an evergreen shrub in the mallow family (*Malvaceae*) that blooms from April to September.

This species may occur in the study area in woodland habitats. There are CNDDDB occurrences within 10 miles of in the study area. The closest CNDDDB occurrence is approximately 2.0 miles from the Project area at the SCVWD's Chesbro Reservoir Spillway where two plants were observed in 2006 (Figure 3.4-1).

**Section 3.4.5 Impacts and Mitigation Measures, Best Management Practices (BMPs), Pages 3.4-36, 3.4-43, 3.4-44, 3.4-49, 3.4-54, and 3.4-55, have been revised as follows:**

➤ ~~BI-12: Avoid Special Status Plant Species and Special Status Natural Communities—applicable to the Maintenance and Operations of all elements.~~

~~The SCVWD BMP BI-12 will minimize potential impacts to sensitive vegetation communities and special-status plants and their potential habitats. This BMP requires that prior to construction activities, a qualified botanist conduct protocol-level focused special-status plant surveys that include surveys for sensitive vegetation communities. This BMP also specifies that special-status plants or sensitive communities that are found should be avoided to the extent possible by flagging the population, creating buffer zones, and timing construction to coincide with less sensitive cycles of the plant species.~~

**Section 3.4.5.2 Preferred Alternative (Tunnel Alternative), BOT-1 T—Potential for adverse effects on rare or important plant communities, and special-status plant species and their suitable habitat, Tables 3.4-4 through 3.4-6, Pages 3.4-32 and 3.4-33, has been revised as follows:**

**Table 3.4-4 Impacts to Vegetation Types and Habitats within CDFW Jurisdiction for the Preferred Alternative <sup>1,2</sup>**

Reach	Riparian Forest (PFO) (ac)		Riparian Scrub-shrub (PSS) (ac)		Upland Herbaceous (U/H) (ac)	Perennial Emergent Marsh (PEM) (ac) <sup>2,3</sup>	Aquatic (ac) <sup>3,4</sup>
	Native	Non-native	Native	Non-native			
4	4.14	5.25	1.26	0.19	7.10	0.00	----
5	0.12	0.74	0.78	0.00	1.11	0.02	----
6	5.56	2.20	4.47	5.07	12.02	0.82	----
7a	0.00	0.00	0.00	0.00	1.02	1.44	----
7b	0.82	0.28	0.01	0.00	5.89	1.99	----
8	0.03	0.00	0.00	0.00	0.42	0.32	----
14	0.18	0.00	0.12	0.01	10.28	0.18	----
<b>Total</b>	<b>10.84</b>	<b>8.46</b>	<b>6.65</b>	<b>5.28</b>	<b>37.83</b>	<b>4.77</b>	<b>28.52</b>

Values are rounded to the nearest 1/100<sup>th</sup> of an acre.

<sup>1</sup> Impacts are permanent and temporary. Table 3.4-5 provides a breakdown of permanent and temporary impacts.

<sup>2</sup> CDFW Jurisdiction includes waters of the State.

<sup>2,3</sup> Impacts associated with rip rap, access ramps, and other design features are not included in these totals, but would generally be minor.

<sup>3,4</sup> Impacts to Aquatic habitat is not broken down by reach.

Source: Adapted from H.T. Harvey & Associates 2013c

**Table 3.4-5 Permanent and Temporary Impacts to USACE and CDFW Jurisdictional Habitats for the Preferred Alternative<sup>1</sup>**

Jurisdiction	Habitat	Permanent Impacts Area (ac)	Temporary Impacts Area (ac)
CDFW	Riparian Forest (PFO) and Riparian Shrub-scrub (PSS), Native	17.48	0.00
	Riparian Forest (PFO) and Riparian Shrub-scrub (PSS), Non-native	13.75	0.00
	Upland Herbaceous	0.42	37.42
USACE	Perennial Emergent Marsh (PEM)	0.32 <sup>42</sup>	4.45
	Aquatic	0.09*	28.43

<sup>1</sup> CDFW Jurisdiction includes waters of the State.

<sup>42</sup> Permanent impacts to wetland and aquatic habitats were calculated based on the 65% design.

Source: adapted from H.T. Harvey & Associates 2013b

**Table 3.4-6 Impacts to Vegetation Types and Habitats outside of CDFW Jurisdiction for the Preferred Alternative<sup>1</sup>**

Vegetation Type or Habitat	Permanent Impacts (Acres)	Temporary Impacts (Acres)
<b>Reach 4</b>		
<del>Riparian Forest (PFO) (native and non-native)</del>	<del>0.8</del>	<del>1.9</del>
<del>Riparian Shrub-shrub (PSS) (native and non-native)</del>	<del>0.4</del>	<del>--</del>
<u>Upland Forest/Woodland (UF/W)</u>	<u>1.5</u>	<u>--</u>
Upland Herbaceous (U/H)	--	<del>29.0</del> <u>28.4</u>
Developed	--	<del>0.7</del> <u>0.6</u>
<b>Reach 5</b>		
<del>Riparian Forest (PFO) (native and non-native)</del>	<del>0.4</del>	<del>0.2</del>
<del>Riparian Shrub-shrub (PSS) (native and non-native)</del>	<del>--</del>	<del>--</del>
<u>Upland Forest/Woodland (UF/W)</u>	<u>0.1</u>	<u>--</u>
Upland Herbaceous (U/H)	--	<del>7.8</del> <u>8.0</u>
Developed	--	0.3
<b>Reach 6</b>		
<del>Riparian Forest (PFO) (native and non-native)</del>	<del>0.4</del>	<del>0.6</del>
<del>Riparian Shrub-shrub (PSS) (native and non-native)</del>	<del>0.2</del>	<del>--</del>
<u>Upland Forest/Woodland (UF/W)</u>	<u>0.8</u>	<u>--</u>
Upland Herbaceous (U/H)	--	<del>22.9</del> <u>23.1</u>
Developed	--	<del>3.0</del> <u>4.0</u>

**Table 3.4-6 Impacts to Vegetation Types and Habitats outside of CDFW Jurisdiction for the Preferred Alternative<sup>1</sup>**

Vegetation Type or Habitat	Permanent Impacts (Acres)	Temporary Impacts (Acres)
<b>Reach 7Aa</b>		
<del>Riparian Forest (PFO) (native and non-native)</del>	<del>0.2</del>	<del>0.4</del>
<del>Riparian Scrub-shrub (PSS) (native and non-native)</del>	<del>0.2</del>	<del>--</del>
<u>Upland Forest/Woodland (UF/W)</u>	<u>0.2</u>	<u>--</u>
Upland Herbaceous (U/H)	--	34.3
Developed	--	0.4
<b>Reach 7Bb</b>		
<del>Riparian Forest (PFO) (native and non-native)</del>	<del>0.4</del>	<del>0.5</del>
<del>Riparian Scrub-shrub (PSS) (native and non-native)</del>	<del>0.4</del>	<del>--</del>
<u>Upland Forest/Woodland (UF/W)</u>	<u>0.4</u>	<u>--</u>
Upland Herbaceous (U/H)	--	<del>9.5</del> <u>9.6</u>
<u>Upland Scrub (U/S)</u>	<u>0.1</u>	<u>--</u>
Developed	--	<del>4.0</del> <u>0.9</u>
<b>Reach 8*</b>		
<del>Riparian Forest (PFO) (native and non-native)</del>	<del>0.3</del>	<del>--</del>
<del>Riparian Scrub-shrub (PSS) (native and non-native)</del>	<del>0.5</del>	<del>--</del>
<u>Perennial Emergent Marsh (PEM)</u>	<u>--</u>	<u>0.4</u>
<u>Upland Forest/Woodland (UF/W)</u>	<u>0.1</u>	<u>--</u>
Upland Herbaceous (U/H)	--	<del>3.4</del> <u>4.4</u>
Developed	--	0.2
<b>Reach 14</b>		
<u>Upland Forest/Woodland (UF/W)</u>	<u>1.0</u>	<u>--</u>
<u>Upland Herbaceous (U/H)</u>	<u>--</u>	<u>18.2</u>
<u>Developed</u>	<u>--</u>	<u>9.9</u>

<sup>1</sup> CDFW Jurisdiction includes waters of the State.

Note: The area of permanent and temporary project impacts for Reach 8 between Hillwood Lane and Llagas Road, are not available. As such, all Riparian Forest and Riparian Scrub-shrub within the work area was conservatively assumed permanently removed and upland herbaceous impacts are assumed to all be temporary because the impacts are associated with construction access and staging areas that will become re-established.

**Section 3.4.5.2 Preferred Alternative (Tunnel Alternative), BOT-1 T—Potential for adverse effects on rare or important plant communities, and special-status plant species and their suitable habitat, Mitigation Measures, Pages 3.4-37 through 3.4-39, has been revised as follows:**

*Mitigation Measure BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species.* Pre-construction protocol-level focused special-status plant surveys shall be conducted in suitable habitat for the four special-status plant species that may occur in the study area (big-scale balsamroot [CNPS listing of 1B.2 \[CNPS 2014\]](#), Loma Prieta hoita [CNPS listing of 1B.1 \[CNPS 2014\]](#), fragrant fritillary [CNPS listing of 1B.2 \[CNPS 2014\]](#), and arcuate bush-mallow [CNPS listing of 1B.2 \[CNPS 2014\]](#)). These surveys shall be conducted according to the CNPS (2001), CDFG (2009), and USFWS (2003) special-status plant survey protocols. Protocols require surveys during the appropriate blooming periods of the target species to determine presence or absence. Different species flower at different times of the year; therefore, more than one survey would likely be necessary. Surveys shall include mapping any sensitive communities observed during the focused plant surveys, except where they were mapped as part of this report.

*Mitigation Measure BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species.* If special-status plant species are found in the study area (see Mitigation Measure BOT-1a T), consultation shall be initiated with USFWS or CDFW to finalize a mitigation plan, as appropriate. If required, the mitigation plan shall minimally include:

- > Preparation by a qualified botanist with experience in native plant restoration, mitigation, and management;
- > Description of avoidance measures, such as construction setbacks, installation of exclusionary fencing prior to and during construction, and pre-construction training of construction personnel on the identification and location of these plants. If sensitive plant species can be avoided, then no further mitigation is required;
- > If special-status plants cannot be avoided, compensatory mitigation for unavoidable impacts, which will include preservation or creation;
- > Creation of a new population using propagules collected from the impact site or protection of an existing population at a ratio of 2 acres preserved for each acre removed or as determined in agency consultation; including clearly defined performance criteria focusing on plant establishment and non-native species control measures and locations and procedures for restoration. Plants shall be salvaged only where feasible as determined by a qualified botanist. Plant salvage will not be conducted in lieu of population creation using local propagules or population preservation.
- > Specification of a minimum 5-year post-construction maintenance and monitoring plan for any plant salvage or habitat creation to ensure that the plant establishment performance criteria are met. The monitoring program shall include potential remedial action measures. Annual reports and a final report shall be prepared and submitted to USFWS or CDFW, as appropriate, to document the success of the mitigation;
- > Secure a source of funding for mitigation and monitoring operations; and
- > Alternatively, plant credits may be purchased at a mitigation bank at a ratio of 2:1 at a local site, or in southern Santa Clara Valley if local options are not available.

*Mitigation Measure BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.* A revegetation and monitoring plan shall be prepared to compensate for impacts to wetlands, ~~Riparian~~ [woodland Forest](#), Riparian Scrub-shrub, and California sycamore woodland. [The overall objective of the Plan is to improve and enlarge the higher quality habitat which creates a continuous corridor for wildlife movement both upstream and downstream of the Project limits. Habitat values will be optimized in the plan based on site available nutrients and hydrology.](#) This plan will address on-site revegetation, as well as off-site

mitigation, and shall be consistent with the Draft Fish and Wildlife Coordination Act Report (CAR) (USFWS 2003) prepared for this Project.

Mitigation ratios for impacts to riparian habitat proposed in the CAR shall be used as a starting point for per-consultation between SCVWD and the regulatory agencies; however the ultimate revegetation proposal will be based on maximizing vegetation given the soil and hydrologic conditions. Per the CAR, mitigation ratios for PFO and PSS habitat impacts range from 1.5:1 to 1.7:1 depending on the reach (USFWS 2003). As provided in the CAR, these ratios may be reduced 40 percent for impacts to non-native PFO and PSS and ~~The SCVWD considered habitat value for native PSS under PFO canopy and proposed a 33 percent reduction in mitigation ratios~~ for impacts to native PSS under PFO canopy that is not removed.

Mitigation ratios for impacts to California sycamore woodland habitat may exceed CAR requirements as determined in consultation with the regulatory agencies (H. T. Harvey & Associates 2013c, 2013d). The ratio for replacement of wetlands is 1:1 for temporary impacts and 2:1 for permanent impacts.

The plan shall provide very specific mitigation requirements for western sycamores, including minimum number for planting, number that must meet performance criteria, very specific performance criteria (to measure vigor, height, stem diameter, period of time without irrigation, period of time without protection from herbivores, etc.), and remedial measures if trees fail.

The plan shall include the following minimum components:

- > Funding
- > Implementation schedule
- > Limits of area for collection of propagules, including very specific requirements for western sycamores to ensure the non-hybrid stock
- > Planting types and densities
- > Irrigation plans
- > Weed control
- > Performance criteria for trees:
- > Performance criteria for habitat:
- > Reporting
- > Adaptive management plan

The plan shall include a restoration element at the Lake Silveira site, as described in Section 2.4.6. This element shall include restoration of the historic creek channel for approximately 2,000 feet, converting much of the open water habitat at Lake Silveira to emergent perennial wetland and shallow open water, installation of islands in the open water habitat, and placement of large woody debris. In addition, the historic channel shall be restored including an aggressive non-native blackberry removal effort, as well as vegetative plantings both of the overstory and understory. While a reduction of flow would be anticipated in the channel that carries flow from the historic channel to the lake, flows are anticipated to be sufficient to support willow riparian vegetation that currently grows at the margins of the channel. The plan elements (see Section 2.4.6) are intended to enhance the proposed revegetation efforts and to provide a more complex, contiguous riparian corridor (H. T. Harvey & Associates 2013a).

*Mitigation Measure BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek.* A plan will be prepared to monitor changes to vegetation and vegetative communities in West/East Little Llagas Creek that may result from altered hydrology related to the Project. Monitoring shall occur in Years 3, 6, and 10 after West/East Little Llagas is cut off from upstream flows to obtain quantities of lost habitat if any. ~~be~~

~~conducted for a minimum of 5 years.~~ The Plan will include monitoring timing, methods, reporting and funding contingencies for replacement for the loss of native mature trees at a minimum 5:1 ratio, loss of riparian habitat would be at a 3:1 ratio, and replacement of wetlands is 2:1. Compensatory mitigation will be required at any time during the monitoring period if changes are detected from altered hydrology. The replacement of the previously delineated wetlands has already been accounted for in BOT-1c. SCVWD will investigate onsite-in-kind opportunities utilizing SCVWD and/or other public owned lands for replacement locations if replacement is necessary. If replanting is not deemed feasible (i.e., soils and hydrology) for onsite planting locations within the watershed, then an out of kind strategy (i.e., Lake Silveira) will be developed by SCVWD staff at higher mitigation ratios subject to approval by the resource agencies.

**Section 3.4.5.2 Preferred Alternative (Tunnel Alternative), BOT-3 T—Conflicts with local policies and/or plans, Pages 3.4-41 and 3.4-42, has been revised as follows:**

**BOT-3 T—Conflicts with local policies and/or plans**

**Impact Determination:** less than significant with mitigation

Project Activity	Construction Impact Level	Operation/Maintenance Impact Level
Construction Activities	LTSM	N/A
Operations and Maintenance Activities	N/A	LTSM

NI = no impact; S = significant; LTS = less than significant; LTSM = less than significant with mitigation; B = beneficial; N/A = not applicable

Construction

Several local plans and policies address preservation of riparian and wetland habitat, including from the Santa Clara County General Plan (C-RC31, R-RC31, and SC 16.10), City of Gilroy Open Space and Conservation Policies (1e and 5b), and the City of Gilroy General Plan Policies (20.01a and 20.03, 20.c). In addition, several other local plan and policies address preservation of special-status plant species, including the City of Gilroy General Plan Policy 20.04. ~~Removal of riparian vegetation and impacts to special-status plant species would conflict with these policies. Implementation of Mitigation Measures BOT-1a through BOT-1d T would identify affected species, develop a revegetation plan, and implement revegetation resulting in impacts that would be less than significant.~~

This alternative will remove riparian vegetation to widen the channel for flood capacity, and that action conflicts with local policies (see Section 3.4.3.3) intended to protect wetlands, and streamside riparian vegetation that have a high priority for preservation. In addition, this alternative has the potential to impact special-status plant species where local policies require preservation of biodiversity (for example Santa Clara County General Plan C-RC 35). The mitigation measures proposed (BOT-1c T) requires development of a restoration plan to establish riparian vegetation, and this plan includes both revegetating along the Project stream corridor on site, as well as improving stream habitat by creating new wetlands, riparian vegetation, and removal of invasive plant species, in the adjacent Lake Silveira mitigation element (see Section 2.4.6). Revegetation required by these mitigation measures will meet all USFWS and CDFW requirements for appropriate mitigation ratios; there are no specific mitigation ratios required under the local plans and policies (except for City of Gilroy General Plan, Action 20.C, which states a 3:1 ratio for wetland mitigation, or as determined in consultation with resource agencies). BOT-1a T and BOT-1b T, requires surveys for special-status plant species prior to construction, and if such special-status species are found, a plan must be prepared in consultation with USFWS or CDFW to avoid, restore, or otherwise mitigate for impacts. In combination, these mitigation measures reduce



impacts to wetland and riparian habitats and on species to less than significant, and thereby eliminate any potential conflicts with local plans and policies.

#### Operations and Maintenance

Operation and maintenance activities could also conflict with local plans and policies. ~~Impacts to riparian habitat, special-status plant species or wetlands could occur~~ when vegetation is removed to maintain channel capacity or other maintenance work is conducted that could impact riparian habitat, special-status plant species, or wetlands; but would be less than significant with implementation of Mitigation Measures BOT-1a through BOT-1cd T as explained above under the construction section ~~would identify affected species, develop a revegetation plan, and implement revegetation resulting in impacts that would be less than significant.~~

#### Best Management Practices (BMPs)

None applicable

#### Mitigation Measures

The following mitigation measures that were described previously would apply. With implementation of these measures conflicts with local policies and/or plans would be less than significant.

*Mitigation Measure BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species.*

*Mitigation Measure BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species.*

*Mitigation Measure BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.*

~~Mitigation Measure BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek.~~

Implementation of the Mitigation Measures BOT-1a, BOT-1b, and BOT-1c, ~~and BOT-1d~~ T would reduce the potential impacts to less than significant.

#### **Section 3.4.5.3 Natural Resources Conservation Service (NRCS) Alternative, BOT-2 NRCS—Potential for adverse effects on jurisdictional wetlands, other waters of the United States and Waters of the State, Best Management Practices (BMPs), Page 3.4-46, has been revised as follows:**

SCVWD BMPs would also minimize potential impacts on wetlands and waters during construction (Appendix C). BMPs BI-10 and BI-11 minimize the vegetation that is cleared and specify pruning techniques, setbacks, and mulching to protect vegetation during construction activities. BMPs BI-4 and WQ-5 reduce potential impacts to vegetation during construction by limiting the disturbance to designated access roads, staging areas, and stockpiling areas. Post-construction revegetation of temporarily disturbed areas would be implemented by using native plant species when feasible according to BMPs BI-13 and WQ-14. These BMPs along with Mitigation Measures BOT-1a and BOT-1b ~~NRCS~~, described above, would assure construction impacts to wetlands would be less than significant.



**Section 3.4.5.3 Natural Resources Conservation Service (NRCS) Alternative, BOT-3 NRCS—Conflicts with local policies and/or plans, Page 3.4-47, has been revised as follows:****BOT-3 NRCS—Conflicts with local policies and/or plans****Impact Determination:** less than significant with mitigation

Project Activity	Construction Impact Level	Operation/Maintenance Impact Level
Construction Activities	LTSM	N/A
Operations and Maintenance Activities	N/A	LTSM

NI = no impact; S = significant; LTS = less than significant; LTSM = less than significant with mitigation; B = beneficial; N/A = not applicable

Construction

Local plans and policies address preservation of riparian and wetland habitat, as well as preservation of special status plant species, that apply to the Preferred Alternative would also apply to the NRCS Alternative. Removal of riparian vegetation and impacts to special-status plant species would conflict with these policies. Implementation of Mitigation Measures BOT-1a through BOT-1d T would identify affected species, develop a revegetation plan, and implement revegetation resulting in impacts that would be less than significant.

This alternative will remove riparian vegetation to widen the channel for flood capacity, and that action conflicts with local policies (see Section 3.4.3.3) intended to protect wetlands, and streamside riparian vegetation that have a high priority for preservation. In addition, this alternative has the potential to impact special-status plant species where local policies require preservation of biodiversity (for example Santa Clara County General Plan C-RC 35). The mitigation measures proposed (BOT-1c T) requires development of a restoration plan to establish riparian vegetation, and this plan includes both revegetating along the Project stream corridor on site, as well as improving stream habitat by creating new wetlands, riparian vegetation, and removal of invasive plant species, in the adjacent Lake Silveira mitigation element (see Section 2.4.6). Revegetation required by these mitigation measures will meet all USFWS and CDFW requirements for appropriate mitigation ratios; there are no specific mitigation ratios required under the local plans and policies (except for City of Gilroy General Plan, Action 20.C, which states a 3:1 ratio for wetland mitigation, or as determined in consultation with resource agencies). BOT-1a T and BOT-1b T, requires surveys for special-status plant species prior to construction, and if such special-status species are found, a plan must be prepared in consultation with USFWS or CDFW to avoid, restore, or otherwise mitigate for impacts. In combination, these mitigation measures reduce impacts to wetland and riparian habitats and on species to less than significant, and thereby eliminate any potential conflicts with local plans and policies.

Best Management Practices (BMPs)

None applicable

Operations and Maintenance

Operation and maintenance activities could also conflict with local plans and policies. ~~Impacts to riparian habitat, special-status plant species or wetlands could occur~~ when vegetation is removed to maintain channel capacity or other maintenance work is conducted ~~that could impact riparian habitat, special-status plant species, or wetlands; but would be less than significant with-~~ implementation of Mitigation Measures BOT-1a through BOT-1cd T ~~as explained above under the construction section would identify affected species, develop a revegetation plan, and implement revegetation resulting in impacts that would be less than significant.~~

### Best Management Practices (BMPs)

None applicable

### Mitigation Measures

The following mitigation measures described above would apply to the NRCS Alternative. With implementation of these measures, conflicts with local policies and/or plans would be less than significant.

*Mitigation Measure BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species.*

*Mitigation Measure BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species.*

*Mitigation Measure BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.*

~~Mitigation Measure BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek.~~

Implementation of the Mitigation Measures BOT-1a, BOT-1b, and BOT-1c, ~~and BOT-1d~~ T would reduce the potential impacts to less than significant.

**Section 3.4.5.4 Culvert/Channel Alternative, BOT-3 CC—Conflicts with local policies and/or plans, Pages 3.4-52 and 3.4-53, has been revised as follows:**

### **BOT-3 CC—Conflicts with local policies and/or plans**

**Impact Determination:** less than significant with mitigation

Project Activity	Construction Impact Level	Operation/Maintenance Impact Level
Construction Activities	LTSM	N/A
Operation and Maintenance Activities	N/A	LTSM

NI = no impact; S = significant; LTS = less than significant; LTSM = less than significant with mitigation; B = beneficial; N/A = not applicable

### Construction

Local plans and policies that address preservation of riparian and wetland habitat, as well as preservation of special-status plant species, that apply to the Preferred Alternative would also apply to the Culvert/Channel Alternative. Removal of riparian vegetation and impacts to special-status plant species would conflict with these policies. Implementation of Mitigation Measures BOT-1a through BOT-1d T would identify affected species, develop a revegetation plan, and implement revegetation resulting in impacts that would be less than significant.

This alternative will remove riparian vegetation to widen the channel for flood capacity, and that action conflicts with local policies (see Section 3.4.3.3) intended to protect wetlands, and streamside riparian vegetation that have a high priority for preservation. In addition, this alternative has the potential to impact special-status plant species where local policies require preservation of biodiversity (for example Santa Clara County General Plan C-RC 35). The mitigation measures proposed (BOT-1c T) requires development of a restoration plan to establish riparian vegetation, and this plan includes both revegetating along the Project stream corridor on site, as well as improving stream habitat by creating new wetlands, riparian vegetation, and removal of invasive plant species, in the adjacent Lake Silveira mitigation element (see Section 2.4.6). Revegetation required by these mitigation measures will meet all USFWS and CDFW requirements for appropriate mitigation ratios; there are no specific mitigation ratios required under the local plans and policies (except for City of Gilroy General Plan, Action 20.C, which states a 3:1 ratio for wetland mitigation, or as determined in consultation with resource agencies).

BOT-1a T and BOT-1b T, requires surveys for special-status plant species prior to construction, and if such special-status species are found, a plan must be prepared in consultation with USFWS or CDFW to avoid, restore, or otherwise mitigate for impacts. In combination, these mitigation measures reduce impacts to wetland and riparian habitats and on species to less than significant, and thereby eliminate any potential conflicts with local plans and policies.

#### Operations and Maintenance

Operation and maintenance activities could also conflict with local plans and policies when vegetation is removed to maintain channel capacity or other maintenance work is conducted that could impact riparian habitat, special-status plant species species, or wetlands; but ~~these impacts~~ would be less than significant with implementation of Mitigation Measures BOT-1a through BOT-1c d T as explained above under the construction section by identifying affected species, developing a revegetation plan, and implementing revegetation.

#### Best Management Practices (BMPs)

None applicable

#### Mitigation Measures

The following mitigation measures, described above, would apply to the Culvert/Channel Alternative. With implementation of these measures, conflicts with local policies and/or plans would be less than significant.

*Mitigation Measure BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species.*

*Mitigation Measure BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species.*

*Mitigation Measure BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.*

Mitigation Measure BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek.

Implementation of the Mitigation Measures BOT-1a, BOT-1b, and BOT-1c, ~~and BOT-1d~~ T would reduce the potential impacts to less than significant.

**Section 3.4.5.5 Reach 6 Bypass Alternative, BOT-3 BY—Conflicts with local policies and/or plans, Page 3.4-58, has been revised as follows:**

#### **BOT-3 BY—Conflicts with local policies and/or plans**

**Impact Determination:** less than significant with mitigation

Project Activity	Construction Impact Level	Operation/Maintenance Impact Level
Construction Activities	LTSM	N/A
Operation and Maintenance Activities	N/A	LTSM

NI = no impact; S = significant; LTS = less than significant; LTSM = less than significant with mitigation; B = beneficial; N/A = not applicable

#### Construction

Local plans and policies that address preservation of riparian and wetland habitat as well as preservation of special-status plant species, that apply to the Preferred Alternative would also apply to the Reach 6 Bypass Alternative. Removal of riparian vegetation and impacts to special-status plant species would conflict with these policies. Implementation of Mitigation Measures BOT-1a through BOT-1d T would

identify affected species, develop a revegetation plan, and implement revegetation resulting in impacts that would be less than significant.

This alternative will remove riparian vegetation to widen the channel for flood capacity, and that action conflicts with local policies (see Section 3.4.3.3) intended to protect wetlands, and streamside riparian vegetation that have a high priority for preservation. In addition, this alternative has the potential to impact special-status plant species where local policies require preservation of biodiversity (for example Santa Clara County General Plan C-RC 35). The mitigation measures proposed (BOT-1c T) requires development of a restoration plan to establish riparian vegetation, and this plan includes both revegetating along the Project stream corridor on site, as well as improving stream habitat by creating new wetlands, riparian vegetation, and removal of invasive plant species, in the adjacent Lake Silveira mitigation element (see Section 2.4.6). Revegetation required by these mitigation measures will meet all USFWS and CDFW requirements for appropriate mitigation ratios; there are no specific mitigation ratios required under the local plans and policies (except for City of Gilroy General Plan, Action 20.C, which states a 3:1 ratio for wetland mitigation, or as determined in consultation with resource agencies). BOT-1a T and BOT-1b T, requires surveys for special-status plant species prior to construction, and if such special-status species are found, a plan must be prepared in consultation with USFWS or CDFW to avoid, restore, or otherwise mitigate for impacts. In combination, these mitigation measures reduce impacts to wetland and riparian habitats and on species to less than significant, and thereby eliminate any potential conflicts with local plans and policies.

#### Operations and Maintenance

Operation and maintenance activities could also conflict with local plans and policies when vegetation is removed to maintain channel capacity or other maintenance work is conducted that could impact riparian habitat, special-status plant species, or wetlands, but would be less than significant with implementation of Mitigation Measures BOT-1a through BOT-1c T as explained above under the construction section by identifying affected species, developing a revegetation plan, and implementing revegetation.

#### Best Management Practices (BMPs)

None applicable

#### Mitigation Measures

The following mitigation measures described above would apply to the Reach 6 Bypass Alternative. With implementation of these measures, conflicts with local policies and/or plans would be less than significant.

*Mitigation Measure BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species.*

*Mitigation Measure BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species.*

*Mitigation Measure BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan.*

~~Mitigation Measure BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek.~~

Implementation of the Mitigation Measures BOT-1a, BOT-1b, and BOT-1c, ~~and BOT-1d~~ T would reduce the potential impacts to less than significant.

#### 1.4.4 Section 3.5 Wildlife Resources

##### **Section 3.5.2.3 Special-status Wildlife Species, Pages 3.5-12 and 3.5-13, has been revised as follows:**

For the purpose of this section, special-status species are wildlife species that meet one or more of the definitions listed below.

- > Species listed or proposed for listing as threatened or endangered under the federal ESA (50 CFR 17.11).
- > Species that are Candidates for possible future listing as threatened or endangered under the federal ESA (61 FR 7591).
- > Species listed or ~~proposed~~Candidates for listing by the State of California as threatened or endangered under CESA (14 CCR 670.5).
- > Species that meet the definitions of rare or endangered under CEQA Guidelines Section 15380.
- > Animals fully protected in California (CDFW Code, Section 3511, 4700, 5050, and 5515).
- > Animal species of special concern to CDFW (CDFW 2011a).

A list of special-status wildlife that are known to occur or potentially occur in the vicinity of the Project area was compiled and evaluated for their potential for occurrence within the Project area. This list is available in Appendix I and provides each species' scientific and common names, status, habitat, and potential to occur in the Project area. The list was compiled based on a review of special-status species records from CNDDDB (CDFW 2012), USFWS online species list (USFWS 2012), and literature resources. The CNDDDB and USFWS database was reviewed for special-status wildlife species that are known to occur or potentially occur in the following U.S. Geological Survey (USGS) 7.5-minute topographic quadrangles: Chittenden, Gilroy, Gilroy Hot Springs, Isabel Valley, Lick Observatory, Loma Prieta, Mississippi Creek, Morgan Hill, Mt. Madonna, Mt. Sizer, San Felipe, Santa Teresa Hill, and Watsonville East. The CNDDDB records of special-status wildlife within 5 miles of the Project area were also reviewed and are shown in Figure 3.5-1.

There is federally designated Critical Habitat for special-status wildlife within 2.5 miles of the Project area (USFWS 2013). Critical habitat for California red-legged frog (CRLF [*Rana aurora draytonii*]) is located over 2.5 miles east of the Project area. Critical habitat for California tiger salamander (CTS [*Ambystoma californiense*]) is located within 2.5 miles and is located south and east of the Project area and southwest of Reaches 5 and 6. Critical habitat for Bay checkerspot butterfly is located within 2.5 miles of the Project area and is found east of Reach 14, north of Reach 8, and west of Reach 6.

The 36 special-status wildlife species in Appendix ~~C~~J were evaluated for their potential to occur in the Project area. Based on an analysis of distribution, known occurrences, and habitat requirements, 17 of the 36 special-status wildlife species evaluated have potential to occur in the Project area (Table 3.5-1). Species evaluated as being unlikely to occur within the Project area are considered to (a) be beyond their known range; ~~or (b) to~~ have low habitat suitability for reproduction, cover, and/or foraging; and (c) be absent because of the presence of dispersal barriers, such as U.S. 101 or busy urban areas that lack connectivity. These species are not discussed further. Species without listing status are not discussed further. Habitat assessments and field surveys for special-status wildlife have been conducted in the Project area, and special-status wildlife was observed during field surveys on November 24, 2009 (WRA 2010), January 4-11, 2013 (H.T. Harvey & Associates 2013e), and May 15 and June 5 and 26, 2013 (H.T. Harvey & Associates 2013f). Species with potential to occur within the Project area, based on the analysis presented in Table 3.5-1 are discussed in further detail below.

Based on USFWS and CNDDDB information, 17 special-status wildlife species or groups are known to occur, or potentially occur, in the vicinity of the Project area including four mammals, six birds, two reptiles, three amphibians and two invertebrates. These species are discussed below.

**Table 3.5-1 Special-status Wildlife Species Potentially Occurring in the Project Area**

Species	Status	Species	Status
<b>Mammals</b>			
Pallid bat <i>Antrozous pallida</i>	CSC	San Joaquin kit fox <i>Vulpes macrotis mutica</i>	FE, CT
San Francisco dusky-footed woodrat <i>Neotoma fuscipes annectens</i>	CSC	American badger <i>Taxidea taxus</i>	CSC
<b>Birds</b>			
Western burrowing owl <i>Athene cunicularia</i>	CSC	Tricolored blackbird <i>Agelaius tricolor</i>	CSC
Least bell's vireo <i>Vireo bellii pusillus</i>	FE, CE	White-tailed kite <i>Elanus leucurus</i>	FP
Bank swallow <i>Riparia riparia</i>	CT	Yellow warbler <i>Dendroica petechial</i>	CSC
<b>Reptiles</b>			
Western pond turtle <i>Actinemys marmorata</i>	CSC	Coast horned lizard <i>Phrynosoma blainvillii</i> , formerly <i>P. coronatum frontale</i>	CSC
<b>Amphibians</b>			
California tiger salamander <i>Ambystoma californiense</i>	FT, <del>STCI</del> , CSC	Foothill yellow-legged frog <i>Rana boylei</i>	CSC
California red-legged frog <i>Rana aurora draytonii</i>	FT, CSC		
<b>Invertebrates</b>			
Bay checkerspot butterfly <i>Euphydryas editha bayensis</i>	FT	Opler's longhorn moth <i>Adela oplerella</i>	FC

Status Codes:

FE: Federally Endangered

FT: Federally listed as Threatened

FP: Fully Protected by the [California Department of Fish and Wildlife \(CDFW\)](#)

FC: Federal Candidate; USFWS have enough information on biological vulnerability and threats to support a proposal to list as endangered or threatened.

CT: State listed as Threatened in California

CE: State listed as Endangered in California

CSC: California species of special concern



**Section 3.5.2.3 Special-status Wildlife Species, California tiger salamander (*Ambystoma californiense*), Page 3.5-20, has been revised as follows:**

Although the likelihood of the species utilizing the Project area is very low, there is potential for this species to occur in the Project area, due to the presence of ~~potentially suitable breeding habitat (i.e., ponded water,~~ suitable upland habitat adjacent to the channel) and dispersal habitat for this species is present adjacent to the main channel of Upper Llagas Creek; however, the habitat is fragmented by development (H.T. Harvey & Associates 2012b; WRA 2010). The Project area is within the migration range of potential breeding habitat, including designated critical habitat (Balance Hydrologics et al. 2012).

The main channel of Upper Llagas Creek has low suitability for breeding as streams are rarely used for reproduction (Zeiner et al. 1988) and the presence of predators (i.e., bullfrogs and fish). However, percolation ponds adjacent to the Project area provide marginal breeding habitat for the species and the upland habitat adjacent to the main channel may be used for subterranean refugia. Although potential suitable breeding habitat exists adjacent to Upper Llagas Creek, there is very low likelihood the species would occur within the Project area due primarily to distance from potential breeding ponds and/or impediments to dispersal from breeding ponds to the Project area (H.T. Harvey & Associates 2012b). Moreover, field studies report low number of small mammal burrows necessary for CTS underground refugia (Condor County Consulting 2012b). Lake Silveira is hydrologically connected to Reach 7A and has perennial surface, thus has the hydrology to support larval development periods for CTS. Field studies, however, did not yield observations of adult, larval, or egg masses of CTS during sampling at Lake Silveira (Balance Hydrologics et al. 2012).

Nevertheless, the presence of CTS cannot be ruled out, ~~as one CTS juvenile was observed in 2010 at the Main Avenue Percolation Ponds adjacent to the Project area (H.T. Harvey & Associates 2012b); and~~ there is designated critical habitat for CTS approximately 1.5 miles to the west of Reach 6 and approximately 2 miles east of Reach 14. Review of the CNDDB found 79 occurrences within 10 miles and 26 occurrences of CTS within 5 miles of the Project area. The closest reported occurrence is 0.01 mile west of Reach 8 along West Edmundson Avenue. The proximity of the site to other records suggests the possibility that CTS from other breeding sites could disperse into the Project area.

**Section 3.5.5 Impacts and Mitigation Measures, Best Management Practices (BMPs), Pages 3.5-47, 3.5-50, 3.5-56, 3.5-60, 3.5-62, 3.5-65, 3.5-68, 3.5-70, 3.5-73, 3.5-75, 3.5-76, 3.5-79, 3.5-81, 3.5-83, 3.5-86, 3.5-88, 3.5-90, 3.5-92, 3.5-95, 3.5-97, 3.5-100, 3.5-102, 3.5-105, and 3.5-107, has been revised as follows:**

➤ ~~BI-12: Avoid Special Status Plant Species and Special Status Natural Communities—applicable to the Maintenance and Operations of all elements.~~

**Section 3.5.5.2 Tunnel Alternative (Preferred Alternative), WILD-2 T—Potential for adverse effects on special-status reptiles and amphibians including western pond turtle and California tiger salamander, Mitigation Measures, Pages 3.5-52 through 3.5-54, has been revised as follows:**

*Mitigation Measure WILD-2a T: Preconstruction Surveys for Special-status Amphibian and Reptile Species.* Preconstruction survey for special-status amphibian and reptiles will include, but not be limited to WPT and CTS. Surveys will be conducted by a qualified biologist in reaches with perennial water, standing ponds, and where in-water construction would be required. Surveyed area would also include adjacent upland habitat, including scrub and annual grassland and clearings in riparian woodland, within dispersal range of the species. Preconstruction surveys will be performed by a qualified biologist within 48-hours prior to construction activities. For areas where construction would occur within identified CTS habitat, SCVWD will consult with CDFW and USFWS to obtain authorization for activities that could affect the species and implement all applicable protection measures specified through the consultation. Protection measures shall be focused on locations where special-status species have been identified within and adjacent to the ROW and where special-status amphibian and reptiles could potentially be

affected, as determined in consultation with CDFW and/or USFWS. Protection measures could include, but are not limited to, the following:

- > Where impacts on potential special-status ~~amphibians and~~ reptile breeding habitat can be avoided, establish site-specific exclusion zones to protect these areas. Install temporary fencing around the exclusion areas with “Sensitive ~~Habitat~~ Area” signs posted.
- > Where it is not possible to avoid work within or adjacent to potential special-status ~~amphibians and~~ reptile breeding sites, limit work in those areas to the period of June 1 to October 14 or ~~f~~From October 15 to May 31, within potential CTS dispersal habitat, minimize operation of ~~p~~Proposed Project vehicles and equipment at night off pavement during rain events and within 24 hours following rain events. Check under vehicles parked overnight off pavement before moving them.
- > From April 1 to August 31 within potential WPT dispersal habitat, minimize operation of ~~p~~Proposed Project vehicles and equipment in upland habitat to minimize potential of crushing nests and dispersing females.

If special-status amphibian and reptile species are found, SCVWD will consult with regulatory agencies regarding translocation to suitable habitat that will not be affected by construction activity. In the unlikely event that egg nests or suitable estivating burrows are discovered within upland habitat, the area will be flagged and a buffer will be installed until proper guidance is received from the appropriate regulatory ~~agency(ies)~~~~agencie(s)~~. If an individual is discovered, aquatic barriers will be installed and the animal will be relocated by a qualified USFWS and/or CDFW-approved biologist and excluded from the work area.

*Mitigation Measure WILD-2b T: Biological Monitor for Dewatering Activities.* During clearance of the work area, after preconstruction surveys have been conducted, an on-site biological monitor will be present, from prior to start of construction activities until the site is dewatered and completely isolated. The monitor will inspect the work area to determine if any wildlife are present and have become entrapped during the dewatering. If special-status species are detected, all construction activity will cease, except as directed by the biological monitor, until these species can be captured and relocated following the guidance of the appropriate regulatory agency.

*Mitigation Measure WILD-2c T: Relocate Special-status Species from Construction Area.* If special-status amphibians and reptiles, such as WPT and CTS, are found in the construction area and need to be relocated, CDFW or USFWS, as appropriate, will be notified prior to commencing the relocation effort. Prior to capturing the animals, the biologist will propose a capture method, handling procedures, and area to which the animals will be moved with the agencies listed above. The person performing the relocation will have all necessary permits for doing such work including FESA Section 10(a)(1)(A) permit. The individual performing the rescue could also be covered under another’s 10(a)(1)(A) permit.

*Mitigation Measure WILD-2d T: Implement Compensatory Mitigation for Special-status Amphibians and Reptiles, including California tiger salamander.* SCVWD will provide mitigation to compensate for unavoidable impacts to special-status amphibians and reptiles and their habitat. Quantification of impacts to special-status amphibians and reptiles will be completed by determining the extent of impacts to lands that are within potentially suitable habitat based upon scientific information and occurrence or in consultation with the appropriate resource agency. The extent of impacts to suitable upland CTS habitat will guide the ratio of compensation necessary to mitigate impacts to less than significant. The ratio of and type of compensation for impacts will follow the appropriate resource agency guidance and recommendation ~~during the process of obtaining a 2081(b) Incidental Take Permit. SCVWD will work with resource agencies to utilize the Valley HP to provide compensation for the protection, enhancement, and/or management of suitable habitat that currently supports or could support the species; mitigation lands for CTS.~~ The suitable habitat ~~for CTS~~ will consist of upland habitat, must be located within Santa Clara County, and within the area where the species is thought to currently occur. Mitigation lands



identification would be based on scientific information and/or in consultation with the appropriate resource agency.

**Section 3.5.5.2 Tunnel Alternative (Preferred Alternative), WILD-4 T—Potential for adverse effects on San Francisco dusky-footed woodrat, Mitigation Measures Pages 3.5-60 and 3.5-61, has been revised as follows:**

*Mitigation Measure WILD-4 T: Preconstruction Surveys for San Francisco Dusky-footed Woodrat Nests prior to Vegetation Removal.* A preconstruction survey would be conducted for San Francisco dusky-footed woodrats and woodrat nests within a 10-foot buffer area of areas proposed for vegetation removal and areas that provide suitable habitat for the species, such as riparian forests along the West Little Llagas Creek, the confluence of Lake Silveira and West Little Llagas Creek, and East Little Llagas Creek. Pre-construction surveys will be conducted no more than 30 days prior to the period of disturbance. If wood rat nests are found, they would be reported to CDFW and flagged for avoidance. Stakes, flags, or plastic tape will be used to enforce avoidance. If any woodrat nests are found that cannot be avoided, ~~trapping and relocation of the wood rat(s) upstream or to a suitable adjacent river or creek nearby will be implemented in consultation with CDFW.~~ SCVWD will work with CDFW to develop a nesting material relocation, enhancement and monitoring plan to minimize impact to this species. ~~If pups are found within the nest, the nest material should be replaced until young are weaned (up to 6 weeks from birth) and are independent of parental care, at which point the nest should be dismantled and relocated.~~

**Section 3.5.5.3 Natural Resources Conservation Service (NRCS) Alternative, WILD-2 NRCS—Potential for adverse effects on special-status reptiles and amphibians, including western pond turtle and California tiger salamander, Best Management Practices (BMPs), Page 3.5-71, has been revised as follows:**

Implementing the above project BMPs would reduce impacts to special-status amphibians and reptiles by preventing their injury or mortality. However, impacts to foraging and breeding habitat may occur if loss of occupied breeding habitat could not be avoided. Loss or removal of breeding habitat from Project activities may result in a substantial impact to some ~~amphibian and~~ reptiles, including ~~CTS and~~ WPT, thus the impact would be significant. When impacts to occupied habitat cannot be avoided the following mitigation measures would be implemented to reduce the construction impacts to special-status amphibians and reptiles to a less-than-significant level.

**Section 3.5.5.4 Culvert/Channel Alternative, WILD-2 CC—Potential for adverse effects on special-status reptiles and amphibians, including western pond turtle and California tiger salamander, Best Management Practices (BMPs), Page 3.5-84, has been revised as follows:**

Implementing the project BMPs for Impact WILD-2 T would reduce impacts to special-status amphibians and reptiles by preventing their injury or mortality. However, impacts to foraging and breeding may occur if loss of occupied breeding habitat could not be avoided. Loss or removal of breeding habitat from Project activities may result in a substantial impact to regional populations of some special-status reptiles ~~and amphibians~~, including WPT ~~and CTS~~, in which case the impact would be significant. When impacts to occupied habitat cannot be avoided the following mitigation measures would be implemented to reduce the construction impacts to these species to a less-than-significant level.

**Section 3.5.5.5 Reach 6 Bypass Alternative, WILD-2 BY—Potential for adverse effects on special-status reptiles and amphibians, including western pond turtle and California tiger salamander, Best Management Practices (BMPs), Page 3.5-98, has been revised as follows:**

Implementing the project BMPs would reduce impacts to special-status amphibians and reptiles by preventing their injury or mortality. However, impacts to foraging and breeding may occur if loss of occupied breeding habitat could not be avoided. Loss or removal of breeding habitat from Project

activities may result in a substantial impact to regional populations of some reptiles ~~and amphibians~~, including WPT ~~and CTS~~, in which case the impact would be significant. When impacts to occupied habitat cannot be avoided and must be impacted as a result of the Project activities, the following mitigation measures would be implemented to reduce the impact to special-status reptiles and amphibians to a less-than-significant level.

#### 1.4.5 Section 3.6 Aquatic Resources

##### **Section 3.6.2.1 Environmental Setting, South-Central California Coast Steelhead (S-CCC), Page 3.6-12, has been revised as follows:**

Steelhead or possibly rainbow trout have been observed just upstream of the Project area in Llagas Creek between Monterey Road and Chesbro Dam. Smith (2007) sampled four sites along this reach in 1997 and found seven juvenile steelhead at the Llagas Road Bridge, just downstream of Chesbro Dam. In 2005, eight juvenile steelhead were found along the same reach. Casagrande (2012) sampled five sites in November 2011 and found a total of ten juvenile steelhead captured at two sites. Seven were captured at near the Llagas Road Bridge, the greatest amount observed since 2005. The remaining steelhead were found near Paradise Land and Bowden Court (upstream of Watsonville Road). All were captured in fast-water habitats (runs and heads of pools). All steelhead observed at the Llagas Road site in 2011 by Casagrande (2012) were young of the year (YOY), ranging in size from 4 to 6 inches (standard length). Yearling steelhead were captured near Bowden Court and were near 9 inches (standard length); and scale samples indicated substantial growth between their first and second years. Casagrande (2011) also observed five YOY near ~~the Llagas Road Bridge (Reach 6)~~ (the first bridge below Chesbro Reservoir) in 2010. The Llagas Avenue Bridge site has the best observed habitat conditions (substrate quality, abundance of riffles, runs, and heads of pools), and scale samples indicated substantial growth for YOY. Moore (2012b) captured a YOY steelhead in a shallow riffle in Llagas Creek just upstream of the inflow to Lake Silveira in May of 2012.

##### **Section 3.6.3.1 Federal, Magnuson-Stevens Fishery Conservation and Management Act, Pages 3.6-12 and 3.6-13, has been revised as follows:**

##### **~~Magnuson-Stevens Fishery Conservation and Management Act~~**

~~The Magnuson-Stevens Fishery Conservation and Management Act (Magnuson-Stevens Act) establishes a management system for national marine and estuarine fishery resources. This legislation requires all federal agencies to consult with NMFS regarding all actions or proposed actions permitted, funded, or undertaken that might adversely affect EFH. EFH is defined as “waters and substrate necessary to fish for spawning, breeding, feeding, or growth to maturity”. The legislation states that migratory routes to and from anadromous fish spawning grounds should also be considered EFH. The phrase “adversely affect” refers to the creation of any impact that reduces the quality or quantity of EFH. Federal activities that occur outside an EFH; but that might, nonetheless, have an impact on EFH waters and substrate, must also be considered in the consultation process. Under the Magnuson-Stevens Act, effects on habitat managed under the Pacific Salmon Fishery Management Plan must also be considered.~~

~~The Magnuson-Stevens Act states that consultation regarding EFH should be consolidated, where appropriate, with the interagency consultation, coordination, and environmental review procedures required by other federal statutes, such as NEPA, the FWCA, the federal CWA, and ESA. In most cases, the environmental compliance required for federal activities will satisfy consultation requirements under the Magnuson-Stevens Act. EFH consultation requirements can be satisfied through concurrent environmental compliance requirements if the lead agency provides NMFS with timely notification of actions that might adversely affect EFH and if the notification meets requirements for EFH assessments.~~

**Section 3.6.4.1 Significance Criteria, Page 3.6-18, has been revised as follows:**

This assessment assumes that a substantial reduction in fish habitat or interference with migratory behavior would directly reduce fish population abundance and alter fish communities, resulting in an adverse impact. In regards to migratory behavior, this assessment distinguishes upstream adult migration and downstream outmigration by juveniles. In regards to reduction in fish habitat, this assessment distinguishes potential for effects on spawning and rearing habitat. Temperature impacts were determined by comparing published tolerance values (e.g., growth rates begin to decline unless food is very abundant >72°F [22°C], lethal temperatures for steelhead >77°F) (Bjornn and Reiser 1991; Smith and Li 1983) to potential future conditions.

**Section 3.6.5.1 No Project Alternative, AQUA-3 NP—Potential for adverse effects on S-CCC steelhead rearing habitat, Page 3.6-21, has been revised as follows:****AQUA-3 NP—Potential for adverse effects on S-CCC steelhead rearing habitat**

**Impact Determination:** significant

Project Activity	Construction Impact Level	Operation/Maintenance Impact Level
Sediment removal at Reaches 4, 5, 6, 7A, 7B, 8, and 14 features would be the same as under existing conditions	N/A	<u>SLTS</u>
Vegetation management at Reaches 4, 5, 6, 7A, 7B, 8, and 14 features would be the same as under existing conditions	N/A	<u>SLTS</u>
Minor maintenance activities at Reaches 4, 5, 6, 7A, 7B, 8, and 14 features would be the same as under existing conditions	N/A	<u>SLTS</u>
<u>Operation of Lake Silveira</u>	<u>N/A</u>	<u>S</u>

NI = no impact; S = significant; LTS = less than significant; LTSM = less than significant with mitigation; B = beneficial; N/A = not applicable

**Section 3.6.5.2 Tunnel Alternative (Preferred Alternative), AQUA-1 T—Potential for adverse effects on upstream migration of adult S-CCC steelhead, Operations and Maintenance, Page 3.6-27, has been revised as follows:**

Flood conveyance channels would be managed to provide adequate capacity for the design flow. The channels would be regularly inspected for the build-up and removal of trash (non-living material) or other obstruction to flow. Impacts to steelhead upstream migration resulting from minor maintenance of channels (as described in Chapter 2) would be minimized by conducting sediment and vegetation management operations between June 15 and October 15, as outlined in Section 2.4.5, operations and maintenance, and SCVWD BMPs. BMP BI-2 includes provisions to conduct preconstruction surveys by a qualified biologist to determine the potential for presence of aquatic species prior to the start of construction. BMPs BI-14 and BI-15 would restore channel features to emulate pre-Project conditions and facilitate fish passage. BMP WQ-12 describes how work sites may be dewatered to conduct sediment maintenance.

Since 2001, the SCVWD has successfully implemented a four tiered, multi-disciplined approach to address the range of issues that LWD can pose in a channel:

1. Evaluate the wood to determine risk of leaving in place and determine aquatic habitat value.
2. Modify the wood while retaining the habitat value.

3. Move the wood to another location.
4. Remove wood entirely and mitigate elsewhere in the watershed.

The assessment of LWD is performed by an engineer, biologist, and field operations administrator. Mitigation is only required for Tier 4, Remove LWD. However, if naturally occurring in-channel features used by upstream migrating steelhead, as hydraulic refuge, are removed (e.g., pieces of LWD), it could negatively affect migration success. This impact would be significant. Mitigation Measure AQUA-1b T would reduce this impact to less than significant.

**Section 3.6.5.2 Tunnel Alternative (Preferred Alternative), AQUA-1 T—Potential for adverse effects on upstream migration of adult S-CCC steelhead, Mitigation Measures, Page 3.6-29, has been revised as follows:**

*Mitigation Measure AQUA-1a T: Steelhead Passage: Channel and Structure Design.* To mitigate the potential passage impediment through the Project area, final channel design will incorporate fish passage criteria from Anadromous Salmonid Passage Facility Design (NMFS 2008) and the California Salmonid Stream Habitat Restoration Manual, Sections XII and Appendices IX-A and IX-B (Flosi et al. 2010). Detailed within ~~this~~these documents are criteria, rationale, and guidelines for designing a range of structures (culverts, weirs, stream crossings, etc.) to provide for proper fish passage. Designing instream structures to allow fish passage requires site-specific analysis of each type of structure, in addition to analysis of hydrology information and river morphology trends. It also requires as well as biological information including regarding the species, life stage, run size, and period of migration. Passage for adult and juvenile salmonids through different types of instream structures would be obtained by following type species and lifestage specific criteria and guidelines, and analyzing site-specific attributes, as described in the guidelines cited above. Structures would be designed to meet the species and lifestage specific guidelines to provide upstream and downstream fish passage over a range of flow conditions. To maintain pools below the falls at least 1.25 times the fall height (Bjornn and Resier 1991).

**Section 3.6.5.2 Tunnel Alternative (Preferred Alternative), AQUA-1 T—Potential for adverse effects on upstream migration of adult S-CCC steelhead, Mitigation Measures, Page 3.6-29, has been revised as follows:**

*Mitigation Measure AQUA-1b T: Steelhead Passage: Inspection of In-channel of Large Woody Debris prior to Removal for Management of Flood Conveyance Channels.* To mitigate the potential removal and loss of in-channel LWD that may be used as hydraulic refuge for upstream migrating adult salmonids, size criteria will be developed whereby in-channel LWD above the size criteria would be inspected prior to removal for flood conveyance. Pieces of wood below the size criteria would not require inspection prior to removal. LWD above the size criteria will be inspected to determine if it poses an erosion hazard or of flood threat, and a biologist will assess if it is ecologically important to the channel, in addition to an engineer and a field administrator. The inspection and evaluation process will remain as is currently practiced, which includes the following steps:

1. Evaluate the wood to determine risk of leaving in place and determine aquatic habitat value.
2. Modify the wood while retaining the habitat value.
3. Move the wood to another location.
4. Remove wood entirely and mitigate elsewhere in the watershed.

If determined not to be a threat, the LWD will remain in the channel but may be modified to prevent debris capture, bank scour, or aggradation. If determined to be a threat, the LWD will be removed and replaced, removed from the channel permanently, or moved to a nearby instream location that reduces flood hazard and maintains ecological function.

**Section 3.6.5.2 Tunnel Alternative (Preferred Alternative), AQUA-2 T—Potential for adverse effects on S-CCC steelhead spawning habitat usage and quality, Construction, Pages 3.6-30 and 3.6-31, has been revised as follows:**

Construction

Construction activities described in Section 2.6, including channel deepening and widening, installation of grade control structures, installation of box culverts/culvert replacements, a new channel bar at the downstream end of Reach 5, installation of instream flow structures for aquatic habitat, and construction of a 2,100-foot-long tunnel, a sediment retention basin and inlet weir, a 2,400 foot reinforced concrete pipe culvert for low flows to existing creek, and restoration of the remnant Llagas Creek channel and creation of a new wetland and riparian woodlands at Lake Silveira) could potentially affect steelhead spawning if these activities occur during their spawning period. Steelhead could potentially spawn within the Project area from December to March during storms large enough to create adequate flow to support spawning conditions. Although, cConstruction would take place year round, but in-channel work would occur to the extent feasible only during the dry season, typically between May 1 and October 15, as defined by the construction schedule (see Section 2.4.3.1). During this time flows are typically low or, in most reaches, the channel is dry and this period is outside the time frame during during which time-adult steelhead are unlikely to be spawning. Consequently, there is little potential for construction activities to interfere with spawning based on the May 1 to October 15 defined in-channel work window. Still, as noted in Impact AQUA-1 T, during wet years, steelhead may migrate upstream either earlier than October 15 or later than May 1 and, thus, may spawn earlier or later within the Project area, as well, during which times construction activities could affect spawning, either from preventing access to spawning habitat or affecting pre-existing redds. The

However, construction activities may still take place in the channel, even if the channel is not dry, by dewatering reaches. Dewatering would be limited to the areas of active construction and would ensure fish passage through Reach 6 and Lake Silveira on Llagas Creek. Dewatering has the potential to directly impact steelhead if present, but could still prevent spawning if steelhead are diverted away from potential spawning habitat or damage or destroy pre-existing redds.

SCVWD BMPs would minimize impacts to steelhead spawning (Appendix D). BMP BI-2 (Appendix D) includes provisions to conduct preconstruction surveys by a qualified biologist to determine the potential for presence of aquatic species prior to the start of construction and may require the relocation of sensitive species in the event they occur in the work area. BMP BI-3 includes provisions to avoid and minimize impacts to salmonids by avoiding routine use of vehicles and equipment in live salmonid streams between January 1 and June 15, while BMP BI-3 would limit the potential interaction between construction activities and spawning steelhead and minimize potential impacts. If migrating steelhead reach spawning habitat within the Project area prior to January 1 (such as during unusually wet years), BMP BI-2 in itself may not reduce direct construction impacts on spawning habitat usage. However, as discussed above, the May 1 to October 15 in-channel work window defined for the Project would substantially limit any risk to spawning steelhead. to less than significant. BMP BI-2 includes provisions to conduct preconstruction surveys by a qualified biologist to determine the presence of aquatic species prior to the start of construction and may require the relocation of sensitive species in the event they occur in the work area. If spawning is occurring within the area, relocation could possibly remove steelhead from more suitable to less suitable (or unusable) spawning habitat. If spawning has recently occurred, cDewatering and construction could destroy pre-existing redds. BMP BI-2 does not include a provision to delay work, or work in an alternative area if spawning is occurring, or spawning has recently occurred (as indicated by the presence of a redd); thus, impacts to steelhead and spawning habitat usage could still occur. Implementation of Mitigation Measures AQUA-2a and AQUA-2b T would reduce impacts related to the construction dewatering of flood conveyance channels during construction on adult S-CCC steelhead spawning habitat and usage to less than significant.



Construction activities could also potentially affect steelhead spawning if these activities result in the increase of fine sediment within potential spawning habitat. Greater volumes of fine sediment within spawning gravel will likely reduce eventual spawning success (Kondolf 2000). Survival to emergence of steelhead fry from redds begins to decrease at 20 percent embeddedness of the redd by fine sediment, and is completely restricted at 80 percent embeddedness (Bjornn and Reiser 1991; Kondolf 2000). As such, if construction activities cause an increase in fine sediment within potential spawning gravel, it could impact spawning habitat quality. SCVWD BMPs would minimize impacts to steelhead spawning habitat (Appendix C): BMPs BI-4, WQ-1, WQ-4, WQ-9, and WQ-40. With implementation of BMPs, this impact would be less than significant.

Channel modifications in Reaches 5 and 6 could result in the excavation of up to 455,000 CY of material (Section 2.4). Reach 5 is dry most of the year, and contains little usable spawning habitat, while Reach 6 is perennial down to San Martin Avenue, fed by flows from Chesbro and Uvas Dams and contains the highest quality spawning habitat within the Project area. The excavation of gravel and cobble would be offset by returning the material to the channel. This impact would be less than significant.

**Section 3.6.5.2 Tunnel Alternative (Preferred Alternative), AQUA-2 T—Potential for adverse effects on S-CCC steelhead spawning habitat usage and quality, Mitigation Measures, Pages 3.6-33 and 3.6-34, has been revised as follows:**

Mitigation Measures

~~Mitigation Measure AQUA-2a T: Preconstruction Surveys prior to In-water Construction. Perform preconstruction surveys in areas where in-water construction would be required during steelhead spawning periods prior to January 1. Preconstruction surveys will be performed by a qualified biologist to determine if steelhead are present or have recently spawned (as indicated by the presence of redds) in the construction area. Steelhead surveys will consist of visual surveys. If present and not spawning, steelhead will be captured and relocated to areas of suitable habitat that will not be affected by the construction activity. If the steelhead are spawning or a redd is detected in the proposed work area, work would cease until such time that work would not impact the redd.~~

*Mitigation Measure AQUA-2b T: Biological Monitor for Dewatering Activities.* During the isolation of the work area, after preconstruction surveys have been conducted, an on-site biological monitor will be present during all working hours from prior to the time activities to isolate the site begin until the site is dewatered and completely isolated. The monitor will inspect the work area to determine if any spawning steelhead or redds are present during the dewatering. If either steelhead are detected, all construction activity will cease, except as directed by the monitor, until the individual can be captured and relocated or until such time that work would not impact the redd.

Implementation of BMPs and Mitigation Measures ~~s AQUA-2a and~~ AQUA-2b T would reduce impacts related to the construction of flood conveyance channels on adult S-CCC steelhead spawning habitat and usage to less than significant.

**Section 3.6.5.3 Natural Resources Conservation Service (NRCS) Alternative, AQUA-2 NRCS—Potential for adverse effects on S-CCC steelhead spawning habitat usage and quality, Mitigation Measures, Page 3.6-47, has been revised as follows:**

Mitigation Measures

~~Mitigation Measure AQUA-2a T: Preconstruction Surveys prior to In-water Construction.~~

*Mitigation Measure AQUA-2b T: Biological Monitor for Dewatering Activities.*

Implementation of ~~Mitigation Measures~~ BMPs and Mitigation Measures ~~s AQUA-2a and AQUA-2b~~ T would reduce impacts related to the construction of flood conveyance channels on adult S-CCC steelhead spawning habitat and usage to less than significant.

**Section 3.6.5.4 Culvert/Channel Alternative, AQUA-2 CC—Potential for adverse effects on S-CCC steelhead spawning habitat usage and quality, Mitigation Measures, Page 3.6-56, has been revised as follows:**

Mitigation Measures

~~Mitigation Measure AQUA-2a T: Preconstruction Surveys prior to In-water Construction.~~

*Mitigation Measure AQUA-2b T: Biological Monitor for Dewatering Activities.*

Implementation of BMPs and Mitigation Measures ~~s AQUA-2a and AQUA-2b~~ T would reduce impacts related to the construction of flood conveyance channels on adult S-CCC steelhead spawning habitat and usage to less than significant.

**Section 3.6.5.4 Culvert/Channel Alternative, AQUA-3 CC—Potential for adverse effects on S-CCC steelhead rearing habitat, Mitigation Measures, Page 3.6-58, has been revised as follows:**

~~In addition to the above Mitigation Measures AQUA-3a and AQUA-3b T, i~~Implementation of Mitigation Measures AQUA-1b, AQUA-1c, BOT-1b, and BOT-1c T and BMPs would reduce impacts related to the maintenance of flood conveyance channels on juvenile steelhead rearing habitat.

**Section 3.6.5.5 Reach 6 Bypass Alternative, AQUA-2 BY—Potential for adverse effects on S-CCC steelhead spawning habitat usage and quality, Mitigation Measures, Page 3.6-67, has been revised as follows:**

Mitigation Measures

~~Mitigation Measure AQUA-2a T: Preconstruction Surveys prior to In-water Construction.~~

*Mitigation Measure AQUA-2b T: Biological Monitor for Dewatering Activities.*

Implementation of BMPs and Mitigation Measures ~~s AQUA-2a and AQUA-2b~~ T would reduce impacts related to the construction of flood conveyance channels on adult S-CCC steelhead spawning habitat and usage to less than significant.

**Section 3.6.5.5 Reach 6 Bypass Alternative, AQUA-3 BY—Potential for adverse effects on S-CCC steelhead rearing habitat, Mitigation Measures, Pages 3.6-68 and 3.6-69, has been revised as follows:**

~~In addition to the above BMPs and Mitigation Measures AQUA-3a and AQUA-3b T, i~~Implementation of Mitigation Measures AQUA-1b, AQUA-1c T, BOT-1b, and BOT-1c T would reduce impacts related to the maintenance of flood conveyance channels on juvenile steelhead rearing habitat.

#### 1.4.6 Section 3.7 Agricultural and Forest Resources

**Section 3.7.5.3 Natural Resources Conservation Service (NRCS) Alternative, AG-1 NRCS—Convert Prime Farmland, Unique Farmland, or Farmland of Statewide or Local Importance, Operations and Maintenance, Page 3.7-22, has been revised as follows:**

Operations and Maintenance

Periodic maintenance and the operation ~~of the flood protection modifications~~ would utilize the existing and proposed maintenance access roads constructed as part of the Project. No additional land would be

~~required~~; therefore, the operations and maintenance of this alternative would not further convert farmland to non-agricultural use.

**Section 3.7.5.4 Culvert/Channel Alternative, AG-1 CC—Convert Prime Farmland, Unique Farmland, or Farmland of Statewide or Local Importance, Operations and Maintenance, Page 3.7-25, has been revised as follows:**

Operations and Maintenance

Periodic maintenance and the operation ~~of the flood protection modifications~~ would utilize the existing and proposed maintenance access roads ~~constructed as part of the Project. No additional land would be required~~; therefore, the operations and maintenance of this alternative would not further convert farmland to non-agricultural use.

**Section 3.7.5.5 Reach 6 Bypass Alternative, AG-1 BY—Convert Prime Farmland, Unique Farmland, or Farmland of Statewide or Local Importance, Operations and Maintenance, Page 3.7-28, has been revised as follows:**

Operations and Maintenance

Periodic maintenance and the operation ~~of the flood protection modifications~~ would utilize the existing and proposed maintenance access roads ~~constructed as part of the Project. No additional land would be required~~; therefore, the operations and maintenance of this alternative would not further convert farmland to non-agricultural use.

**1.4.7      Section 3.12 Noise**

**Section 3.12.5.2 Tunnel Alternative (Preferred Alternative), NOI-2 T—Generation of excessive groundborne vibration, Mitigation Measures, Page 3.12-34, has been revised as follows:**

*Mitigation Measures NOI-2c T: Notify Residents of Pile Driving Activities/Vibratory Compactor Use.* Notify residents within 25 feet of any access road or within 200 feet of any impact ~~nonvibratory~~ pile driving or vibratory compactor activities regarding the potential for perceptible vibration. Advise them that vibration from vibratory compactors or impact pile driving activities temporarily operating along nearby haul roads may cause objects on walls and shelves to move and encourage them to move precious and fragile items off walls and shelves.

**Section 3.12.5.2 Tunnel Alternative (Preferred Alternative), NOI-4 T—Substantial temporary increase in ambient noise levels, Best Management Practices (BMPs), Page 3.12-38, has been revised as follows:**

The SCVWD's BMP NO-1 would reduce noise produced by construction activities to below applicable noise standards where feasible, while SCVWD's BMP NO-2 will implement the measures in residential areas surrounding work sites. ~~Additionally, Mitigation Measure NOI-1a, NOI-1b, and NOI-1c T would reduce noise levels for construction along all reaches, all of which would reduce temporary noise impacts. BMPs specific to tunnel construction (listed in NOI-1 T above) would also reduce noise impacts.~~

**Section 3.12.5.4 Culvert/Channel Alternative, NOI-4 CC—Substantial temporary increase in ambient noise levels, Best Management Practices (BMPs), Page 3.12-61, has been revised as follows:**

The SCVWD's BMP NO-1 would reduce noise produced by construction activities to below applicable noise standards where feasible, while SCVWD's BMP NO-2 will implement the measures in residential areas surrounding work sites. ~~Additional Mitigation Measure NOI-1 NRCS would reduce noise levels for construction along all reaches, all of which would reduce temporary noise impacts.~~



**Section 3.12.5.5 Reach 6 Bypass Alternative, NOI-1 BY—Noise generation levels in excess of established standards, Best Management Practices (BMPs) and Mitigation Measures, Pages 3.12-66 and 3.12-67, has been revised as follows:**

~~Implementation of BMPs NO-1 and NO-2 and Mitigation Measure NOI-1 NRCS would reduce noise levels from construction equipment along all reaches; however, due to the distance between work areas and receptors along these reaches, impacts would not be reduced to less than significant levels. Therefore, impacts associated with noise standards exceedence for construction activity would remain significant and unavoidable.~~

Mitigation Measures

Implementation of BMPs NO-1 and NO-2, BMPs specific to tunnel construction, Mitigation Measures ~~NOI-1 NRCS~~, NOI-1a T, and NOI-1b T, the use of sound barriers along Reach 8 work sites, and adherence to the Blasting Plan would reduce construction noise impacts. However, due to the distance between work areas and receptors along all reaches, impacts would not be reduced to less-than-significant levels. Therefore, impacts associated with noise standards exceedence for both construction and operation and maintenance activities would remain significant.

**1.4.8      Section 3.14 Utilities and Public Services**

**Section 3.14.2.2 Utilities, Water, Page 3.14-3, has been revised as follows:**

Figure 3.14-1 shows the location of 11 wells that are within 500 feet of the Project area. There is one well each along or near both Reaches 8 and 7B. There are three wells along Reach 14 while six of the wells are along or near Reach 6. The SCVWD operates four of the wells, three of which are close to the recharge ponds along Reach 6. The other SCVWD well is along Reach 7B. The other seven wells are operated by private entities for the purposes of water supply and/or irrigation wells. There is an additional well in Reach 4 within 12 feet of the creek; therefore the total wells identified within 500 feet of the Project area is 12.

**1.4.9      Section 3.15 Recreation Resources**

**Section 3.15.5.2 Tunnel Alternative (Preferred Alternative), REC-1 T—Disrupt access to or diminish quality of existing recreational resources, such as parks or trails, Mitigation Measures, Page 3.15-9, has been revised as follows:**

*Mitigation Measure REC-1a T: Trail Detour.* SCVWD will work with the City of Morgan Hill to determine an alternate route for the trail through city streets until the city decides that they will re-establish the paved trail in the future. The detour trail would be on sidewalks and city streets with signage and markings to delineate the detour and notice will be posted 30 days in advance of detour.

*Mitigation Measure REC-1b T: Recreational Facility Protection.* Public recreational lands or facilities within or close to the Project footprint should be avoided during construction, if possible. If a public recreational facility is impacted during construction, SCVWD will return the facility to equal or better condition after construction is completed. If parking areas are impacted during or after Project construction, alternative parking will be provided. If a facility is completely closed due to Project construction, SCVWD will, to the best extent possible, limit the amount of time of the closure or target the closure for times of lower park use. If it is determined that parklands or parking areas would need to be closed for an extended time period, the viability of developing a temporary opportunity in lieu of the closed facility should be considered and provided, if possible. This mitigation measure would not apply to SCVWD owned lands, including the West Llagas Trail.

*Mitigation Measure REC-1c T: Public Outreach.* If a park or trail is impacted during construction, an outreach plan will be developed to inform the public before the closure or access limitation. Outreach will

be conducted by posting flyers or informational boards at parks or other public spaces, posting information on pertinent websites or in a newspaper. The outreach information will inform residents and park visitors about the purpose of the construction, the length of time expected to complete the Project, ~~and~~ of similar recreational opportunities in the vicinity of the study area, and notice will be posted 30 days in advance of closure/access changes.

This impact would be less than significant with mitigation.

#### **1.4.10      Section 3.16 Population and Housing**

**Section 3.16.5.4 Culvert/Channel Alternative, POP-2 CC—Displace substantial numbers of existing housing and/or people, Operations and Maintenance, Page 3.16-10, has been revised as follows:**

##### Operations and Maintenance

Since Project-related operations and maintenance would be the same as the ongoing program, no new workers would be needed. Further, the operations and maintenance of the ~~Culvert/Channel~~ NRCS Alternative is not expected to displace existing housing or people, because the removal of homes is not necessary to complete these activities; therefore, no impact would result.

**Section 3.16.5.5 Reach 6 Bypass Alternative, POP-2 BY—Displace substantial numbers of existing housing and/or people, Operations and Maintenance, Page 3.16-12, has been revised as follows:**

##### Operations and Maintenance

Since Project-related operations and maintenance would be the same as the ongoing program, no new workers would be needed. Further, the operations and maintenance of the ~~Reach 6 Bypass~~ NRCS Alternative is not expected to displace existing housing or people, because the removal of homes is not necessary to complete these activities; therefore, no impact would result.

### **1.5            Chapter 4 Other CEQA Considerations**

#### **1.5.1        Section 4.1.3 Cumulative Impact Discussion**

**Section 4.1.3.4 Biological Resources (Aquatic, Wildlife, and Botanical) has been revised as follows:**

##### **Impact 4.4—Cumulative impact on biological resources**

**Impact Determination:** less than cumulatively significant with mitigation

As discussed in Section 3.4, Botanical Resources, the Project could temporarily and permanently affect native vegetation and jurisdictional wetlands and waters that are located within the stream reaches, and these impacts would be less than significant with mitigation. The projects identified within the Project footprint (Wright-Mañana Residential Development and Butterfield Boulevard South Extension) did not affect wetlands. Given that most of the proposed development is in urban areas, they are unlikely to affect wetlands, and while proposed trails could be located near wetlands, it is not likely that wetlands would be removed to allow their construction. Thus, cumulative impacts to wetlands are not expected to occur. If other projects did affect wetlands, cumulative impacts would be significant, and the Project alternatives' contribution would be considerable. It would be reduced to less than significant through implementation of Mitigation Measures BOT-1c T, BOT-1d T, and BOT-1e T, as described in Section 3.4.

All of the Project alternatives would have less than significant impacts with mitigation on sensitive plant communities (except California sycamore woodlands), riparian communities, special-status plants and their habitats. Impacts on sycamore woodlands would be significant and unavoidable for all alternatives.

The Wright-Mañana Residential Development, Butterfield Boulevard South Extension, and Cochrane–Borello Residential Development Project, also had or would have impacts on trees. The Wright-Mañana Residential Development removed 36 trees; the Butterfield Extension removed 25 trees, 13 of which met the definition of a significant size (City of Morgan Hill 2010d); and the Cochrane–Borello Residential Development Project would remove 58 ordinance-sized trees in addition to all the orchard trees in the Project area (Morgan Hill 2012). It is likely that other projects could affect botanical resources, as well.

Thus, the cumulative impact would be significant, and the Project alternatives' contribution would be considerable. It would be reduced to less than cumulatively considerable with the implementation of Mitigation Measures BOT-1a T, BOT-1b T, BOT-1c T, BOT-1d T, and BOT-1e T because impacts would be reduced or avoided, with the exception of impacts to sycamore trees, which would remain significant. Other projects would be required to implement measures to reduce or avoid impacts as well.

The requirements outlined in the Butterfield Boulevard Extension Mitigated Negative Declaration (MND) (City of Morgan Hill 2010d) to protect trees and replace trees impacted or removed during demolition and grading activities also demonstrates that projects in the area are held to a high standard for tree preservation.

The Butterfield Boulevard Extension also had a riparian habitat restoration plan with a replacement ratio of 3:1 (3 acres of habitat created for each acre disturbed), and the restoration will be monitored for 5 years (City of Morgan Hill 2010d). The local agencies are controlling the cumulative reduction of vegetation in the region, as demonstrated in the conditions of these projects.

Mitigation required with the Proposed Project would result in defined riparian zones, which would be beneficial to both aquatic and terrestrial wildlife and would likely be an improvement over current conditions. Thus, no cumulative impacts would occur.

As discussed in Section 3.5, Wildlife Resources, the Project alternatives could adversely affect sensitive habitats used by special-status species, including burrowing owl, western pond turtle, California tiger salamander (CTS), special-status birds, and San Francisco dusky-footed woodrat. Direct mortality or injury could occur from animals being crushed by construction vehicles, or becoming entrapped in construction trenches associated with channel excavation. Implementation of various SCVWD BMPs related to water quality and biological resources would minimize the Project's potential impacts on special-status birds and bats, CTS, and western pond turtle, although impacts would remain significant, requiring mitigation. Other projects likely would have impacts on wildlife resources, as well, and cumulative impacts would be significant. In particular, future projects could have the potential to affect dusky footed woodrats and CTS related to the High Speed Rail Project and various trails, parks, and recreational master plans or housing development in areas that currently of minimal urban disturbance. The Project alternatives' contribution to this impact would be considerable, but would be reduced to less than considerable by implementation of Mitigation Measures WILD-1a T, [WILD-1b T](#), [WILD-1c T](#), [WILD-2c T](#), [WILD-2d T](#), [WILD-2f T](#), as well as other measures described in Section 3.5.

Other projects would be required to implement mitigation measures, as well. The City of Morgan Hill has a Burrowing Owl Habitat Mitigation Plan, which includes a 250-foot buffer from occupied burrows during breeding season (City of Morgan Hill 2005, 2010d). In addition, the California Department of Fish and Wildlife (CDFW) has new protocols for burrowing owls, established in 2012. These regulations are focused on preventing cumulative impacts on burrowing owls in the area.

The Wright-Mañana Residential Development permit also contained conditions to protect nesting raptors. The permit contains time periods for avoiding nesting season and surveys and buffers in consultation with CDFW if breeding season could not be avoided (City of Morgan Hill 2005). The Butterfield project proposed to conduct vegetation and tree removal during non-breeding season (scheduled removal to occur between September 1 and February 1) (City of Morgan Hill 2010d). The Cochrane-Borello Residential Development Project EIR included mitigation requiring that project construction be scheduled to commence between February 1 and August 31; a preconstruction survey will be conducted by a

qualified biologist for nesting birds within the onsite trees, as well as all trees within 250 feet of the site. This survey will occur within 30 days of the onset of construction. If pre-construction surveys undertaken during the nesting season locate active nests within or near construction zones, these nests and an appropriate buffer around them (as determined by a qualified biologist) will remain off-limits to construction until the nesting season is over. Suitable setbacks from occupied nests will be established by a qualified biologist and maintained until the conclusion of the nesting season.

Between the Project, the Butterfield Extension, the Wright-Mañana Residential Development Project, and the Cochrane-Borello Residential Development Project, approximately 2,300 trees were or would be removed, and additional trees could be removed by other development. The trees defined as significant in size that could be considered roosting habit could total 100 trees or more between the four projects. Although 100 trees are being removed, ample trees would remain in the area that would be available for nesting including the upper reaches of Llagas Creek; therefore, the impact on roosting and nesting habitat for raptors and bats would be cumulatively less than significant.

The Santa Clara Valley Habitat Plan is an important program to prevent cumulative impacts to sensitive biological resources in Santa Clara County. The Plan will protect, enhance, and restore natural resources in specific areas of Santa Clara County and contribute to the recovery of certain special-status species. Rather than separately permitting and mitigating individual projects, the Plan evaluates natural-resource impacts and mitigation requirements comprehensively in a way that is more efficient and effective for at-risk species and their essential habitats. The Plan allows the County of Santa Clara, Santa Clara Valley Water District, Santa Clara Valley Transportation Authority, and the cities of Gilroy, Morgan Hill, and San Jose to receive endangered-species permits for activities and projects they conduct and those under their jurisdiction. Although the Project is not part of the Plan, all covered activities with potential impacts to sensitive biological resources would need to comply with the relevant mitigations outlined in the Plan to obtain necessary permits, which will reduce the overall cumulative impact to sensitive biological resources in the county.

As described in Section 3.6, Aquatic Resources, the Project alternatives would result in significant impacts requiring mitigation on steelhead migration and spawning and rearing habitat in Llagas Creek during construction and maintenance, as well as other less than significant impacts. They also would result in less than significant impacts on other aquatic resources. Two other SCVWD projects have been identified that could affect steelhead and other aquatic resources in other watersheds—the Anderson Dam Seismic Retrofit project and the Almaden Lake Project, both of which are in the planning stages.

The impacts of the Project alternatives that are characterized as less than significant would not result in significant cumulative impacts in combination with the impacts of other projects because SCVWD BMPs would be implemented that would effectively minimize the potential for adverse impacts on aquatic resources so that no population-level impacts would occur, and no other projects are located in the same watershed that could compound (worsen) the effects of the Project alternatives.

The SCVWD's BMPs include provisions to conduct preconstruction surveys by a qualified biologist to determine the potential for presence of aquatic species prior to the start of construction and avoidance and minimization of impacts to salmonids by avoiding routine use of vehicles and equipment in live salmonid streams between January 1 and June 15 for all instream work. Regardless, the Project alternatives would cause changes in spawning habitat usage and quality, affect rearing habitat, and impede downstream migration of juveniles. The Anderson Dam and Almaden Lake projects also would affect steelhead by potential water quality degradation or impeding migration specific to their watersheds. The impact would be cumulatively significant because each of these projects could adversely affect the population of steelhead, and the Project alternatives' contribution would be considerable.

The Project alternatives' contribution would be reduced to less than considerable through implementation of mitigation measures ~~AQUA-2a T~~, AQUA 2b, BOT-1b T, and BOT-1d T (construction); and AQUA-1a T and AQUA-1b T (maintenance), which would reduce or avoid impacts. Additionally, other conditions may

be imposed during the permitting process for all three projects, which would further reduce the potential for cumulative impacts.

#### Mitigation Measures

*Mitigation Measure BOT-1a T: Conduct Focused Protocol-level Surveys for Special-status Plant Species.*

*Mitigation Measure BOT-1b T: Prepare a Mitigation Plan for Special-status Plant Species.*

*Mitigation Measure BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan*

*Mitigation Measure BOT-1d T: Prepare a Monitoring Plan for West/East Little Llagas Creek.*

*Mitigation Measure BOT-1e T: Dispose of Invasive Non-native Species.*

*Mitigation Measure WILD-1a T: Vegetation Removal during Avian Non-breeding Season.*

~~*Mitigation Measure WILD-1b T: Western Burrowing Owl Preconstruction Surveys and Avoidance Measures.*~~

~~*Mitigation Measure WILD-1c T: Implementing Compensatory Mitigation for Western Burrowing Owl.*~~

*Mitigation Measure WILD-2c T: Relocate Special-status Species from Construction Area*

*Mitigation Measure WILD-2d T: Implement Compensatory Mitigation for Special-status Amphibians and Reptiles, including California tiger salamander.*

*Mitigation Measure WILD-2f T: Special-status Species Environmental Awareness Training and Construction Avoidance Measures.*

*Mitigation Measure AQUA-1a T: Steelhead Passage: Channel and Structure Design.*

*Mitigation Measure AQUA-1b T: Steelhead Passage: Inspection of In-channel of Large Woody Debris*

~~*Mitigation Measure AQUA-2a T: Preconstruction Surveys prior to In-water Construction*~~

*Mitigation Measure AQUA-2b T: Biological Monitor for Dewatering Activities.*

#### **Section 4.1.3.8 Traffic and Circulation has been revised as follows:**

#### **Impact 4.8—Cumulative impact on transportation network**

**Impact Determination:** less than cumulatively significant with mitigation

The Project would result in a temporary increase in traffic levels during construction, largely in the immediate Project area and along access routes. Construction would involve heavy equipment access, construction-related traffic, truck trips to dispose of fill at Anderson Dam (223,866 truck trips over a 6-year period), deterioration of local roads, temporary detours on U.S. 101 (Reach 6 Bypass Alternative only), and temporary impacts to parking spots at the Morgan Hill Plaza Shopping. The Project alternatives were found to cause an increase in traffic in relation to the existing traffic load and capacity of the street system for a number of local roads, including Cochrane Road.

These effects are expected to be separated in location and time from the traffic effects of other projects, with the exception of the Cochrane-Borello Project. The Cochrane-Borello Project has a schedule similar to that for the proposed Project and would require use of some of the same major roadways, primarily Cochrane Road. According to the project's EIR, the Cochrane-Borello proposed project would result in approximately 3,255 new daily vehicle trips, and 248 and 324 new morning and afternoon peak hour vehicle trips, respectively. The project-generated vehicle trips would be distributed as follows: 45 percent from the north on US 101, 25 percent from the south on US 101, and 30 percent from the west on Cochrane Road. According to the EIR, the addition of project trips would not degrade acceptable LOS E

freeway operations to unacceptable levels (LOS F), and under project conditions, all study intersections are estimated to operate at acceptable levels of service, at LOS C or better during both peak hour periods. The addition of traffic associated with Project construction to that generated by the Cochrane-Borelo Project would cause a significant cumulative impact on Cochrane Road during construction, and the Project's contribution would be cumulatively considerable. The Project's contribution to the significant impact would be reduced to less than cumulatively considerable by the implementation of mitigation measures included in Section 3.10 and implementation of the Traffic Management Plan.

#### Mitigation Measures

*Mitigation Measure TRAFFIC-1aT: Maintain Access to Local Residences and Businesses.*

*Mitigation Measure TRAFFIC-5**~~4b~~**T: Coordinate with Local Business Regarding Parking.*

~~*Mitigation Measure TRAFFIC-1cT: Coordinate with Local Business Regarding Access.*~~

## **1.6 Chapter 7 References**

**Pages 7-6, 7-9, and 7.16 have been revised as follows:**

California Native Plant Society (CNPS). 2014. *Rare, and Endangered Plants Inventory*. online database. Available online at: <http://www.rareplants.cnps.org/> Plant search: big-scale balsamroot, Loma Prieta hoita, fragrant fritillary, and arcuate bush-mallow. March 6.

Flosi, G. S. Downie, J. Hopelain, M. Bird, R. Coey and B. Collins. 2010. *California Salmonid Stream Habitat Restoration Manual*, Fourth Edition. California Department of Fish and Game. Sacramento, California.

Santa Clara Valley Water District (SCVWD). 2002. *Instream Wetland Vegetation Regrowth Study, Fourth Annual Report: Results for 2001*. San Jose, California.

Smith, J. J. and H. W. Li. 1983. *Energetic factors influencing foraging tactics of juvenile steelhead trout, *Salmo gairdneri**. Pages 173-180 in D.L. G. Nokes, D. G. Lindquist, G. S. Hlfman and J. A. Ward, editors. *Predators and prey in fishes*. Dr. W. Junk, the Hague, Netherlands.



## 1.7 Appendix C Upper Llagas Creek Project Comprehensive BMPs

Page C-10 has been revised as follows:

### Hydrology/Water Quality

#### WQ-10

#### Limit Impact of Concrete Near Waterways

Concrete that has not been cured is alkaline and can increase the pH of the water; fresh concrete will be isolated until it no longer poses a threat to water quality using the following appropriate measures:

1. Wet sacked concrete will be excluded from the wetted channel for a period of ~~30 days~~<sup>two weeks</sup> after installation. During that time, the wet sacked concrete will be kept moist (such as covering with wet carpet) and runoff from the wet sacked concrete will not be allowed to enter a live stream.
2. Poured concrete will be excluded from the wetted channel for a period of ~~30 days~~<sup>two weeks</sup> after it is poured. During that time, the poured concrete will be kept moist, and runoff from the wet concrete will not be allowed to enter a live stream. Commercial sealants (e.g., Deep Seal, Elasto-Deck Reservoir Grade) may be applied to the poured concrete surface where difficulty in excluding water flow for a long period may occur. If a sealant is used, water will be excluded from the site until the sealant is dry.
3. Dry sacked concrete will not be used in any channel.
4. An area outside of the channel and floodplain will be designated to clean out concrete transit vehicles.














## **1.8      Appendix E Impacts to Vegetation Types and Habitats for the Tunnel (Preferred) Alternative**

**Maps 1 through 25 have been revised as follows:**

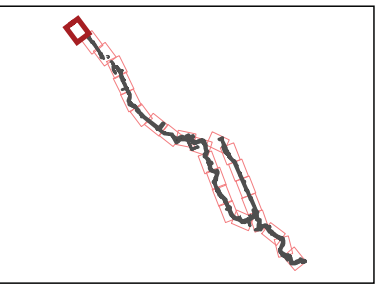


**Appendix E**  
**Impacts to Vegetation Types**  
**and Habitats for the**  
**Study Area**

**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
  - Riparian Forest (PFO) 
  - Riparian Scrub-shrub (PSS) 
  - Perennial Emergent Marsh (PEM) 
  - Upland Forest/Woodland (UF/W) 
  - Upland Herbaceous (U/H) 
  - Upland Scrub (U/S) 
- Other Habitat Types**
  - Aquatic 
  - Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b


















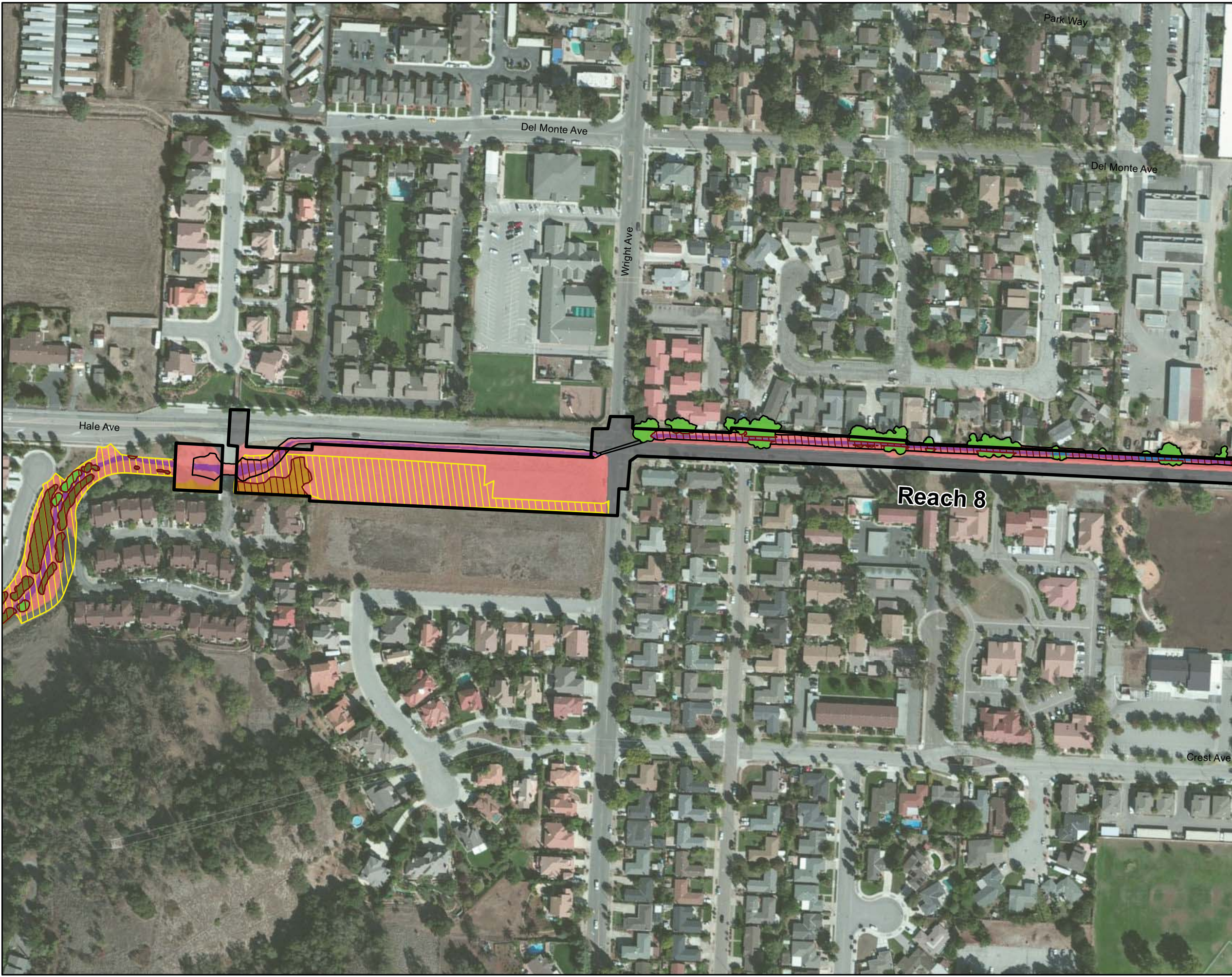
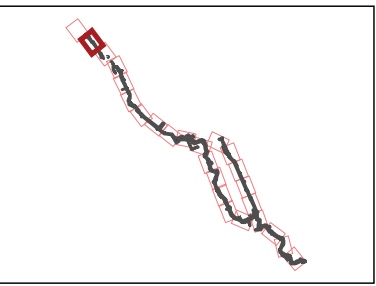




**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
  - Riparian Forest (PFO) 
  - Riparian Scrub-shrub (PSS) 
  - Perennial Emergent Marsh (PEM) 
  - Upland Forest/Woodland (UF/W) 
  - Upland Herbaceous (U/H) 
  - Upland Scrub (U/S) 
- Other Habitat Types**
  - Aquatic 
  - Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b




















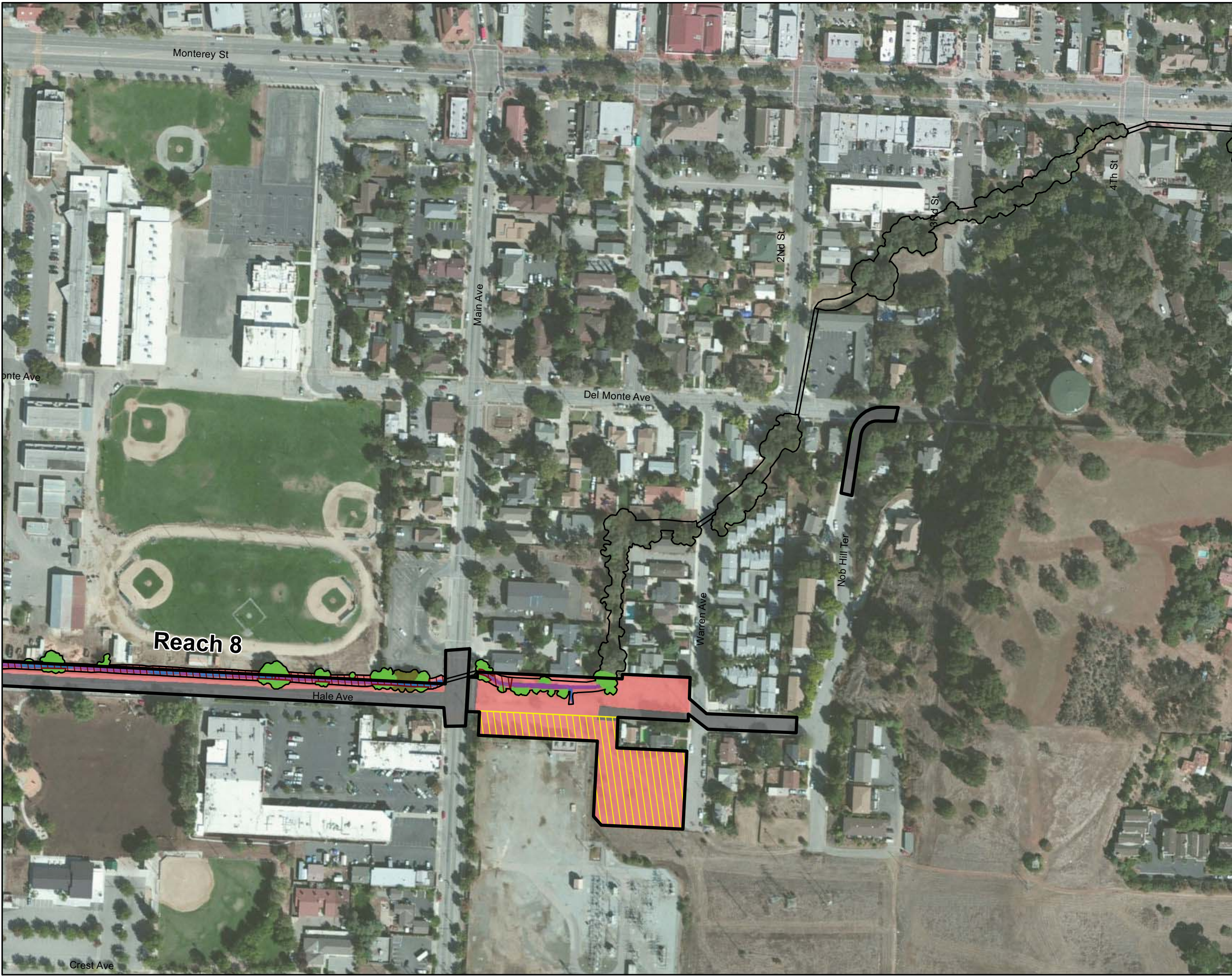
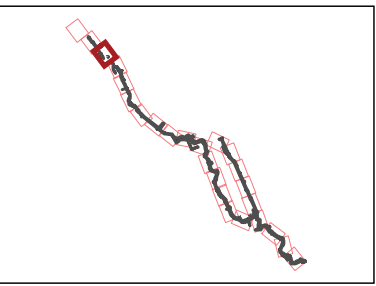


**Appendix E**  
**Impacts to Vegetation Types**  
**and Habitats for the**  
**Study Area**

**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
  - Riparian Forest (PFO) 
  - Riparian Scrub-shrub (PSS) 
  - Perennial Emergent Marsh (PEM) 
  - Upland Forest/Woodland (UF/W) 
  - Upland Herbaceous (U/H) 
  - Upland Scrub (U/S) 
- Other Habitat Types**
  - Aquatic 
  - Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b


















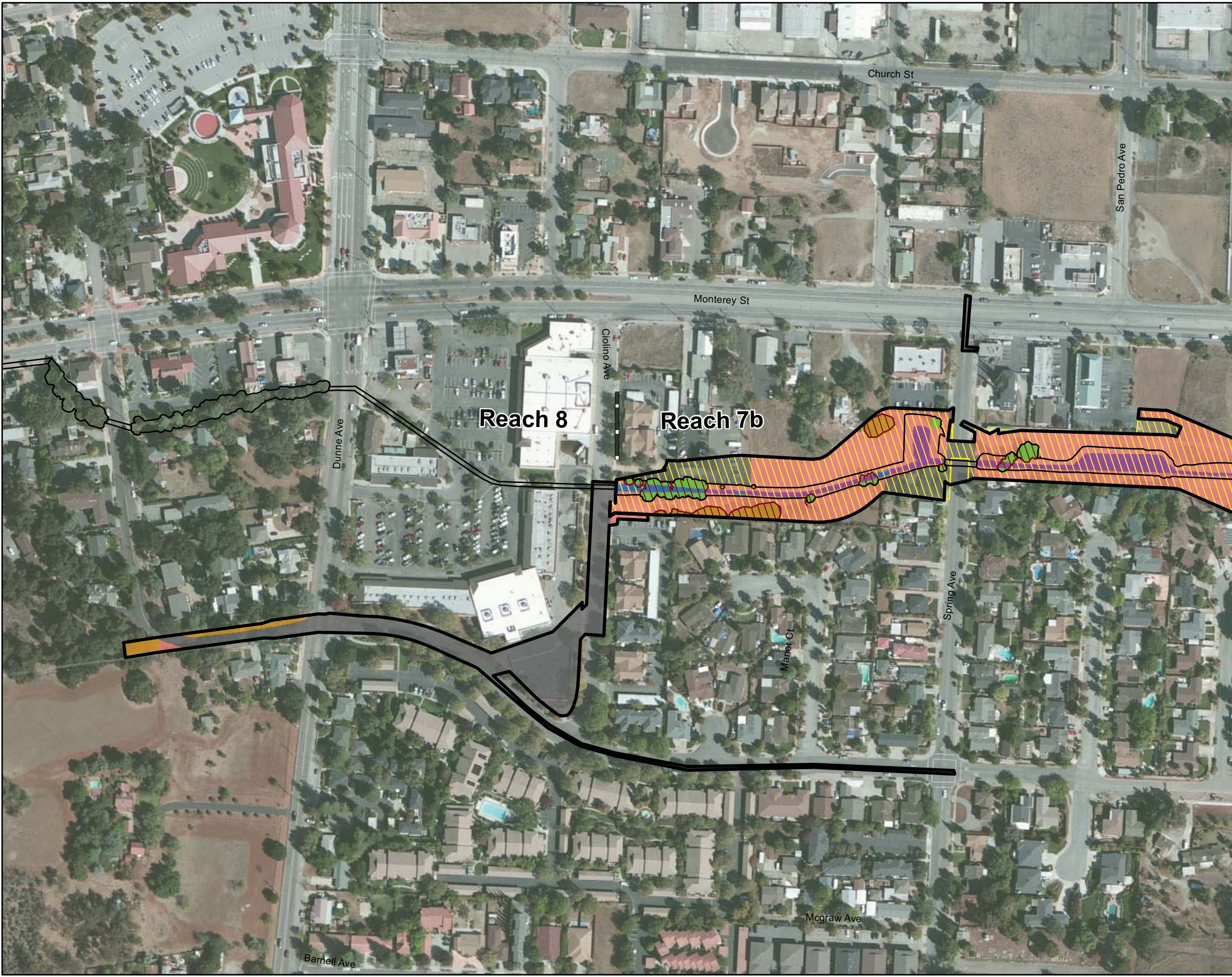
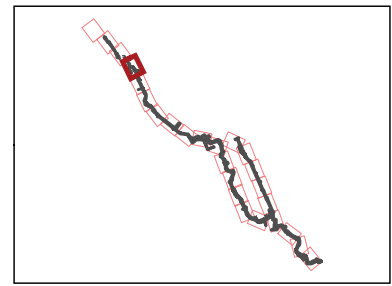




**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
  - Riparian Forest (PFO) 
  - Riparian Scrub-shrub (PSS) 
  - Perennial Emergent Marsh (PEM) 
  - Upland Forest/Woodland (UF/W) 
  - Upland Herbaceous (U/H) 
  - Upland Scrub (U/S) 
- Other Habitat Types**
  - Aquatic 
  - Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b
















**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 

**CAR Habitat Types**

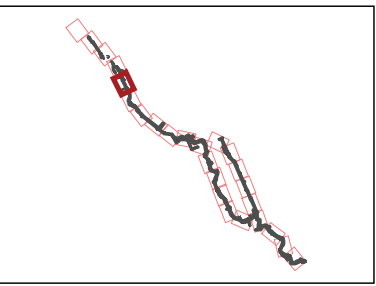
- Riparian Forest (PFO) 
- Riparian Scrub-shrub (PSS) 
- Perennial Emergent Marsh (PEM) 
- Upland Forest/Woodland (UF/W) 
- Upland Herbaceous (U/H) 
- Upland Scrub (U/S) 

**Other Habitat Types**

- Aquatic 
- Developed 

Reach 7b

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b













**Legend**

Reach Break 


Project Footprint 


CDFW Jurisdiction Boundary 

Temporary Impact 


Permanent Impacts 


**CAR Habitat Types**


Riparian Forest (PFO) 

Riparian Scrub-shrub (PSS) 

Perennial Emergent Marsh (PEM) 


Upland Forest/Woodland (UF/W) 

Upland Herbaceous (U/H) 

Upland Scrub (U/S) 

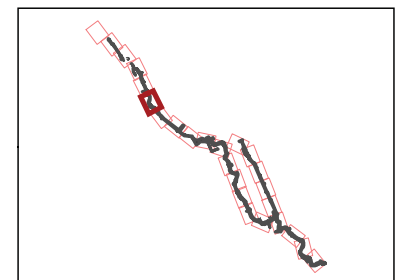
**Other Habitat Types**

Aquatic 

Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b

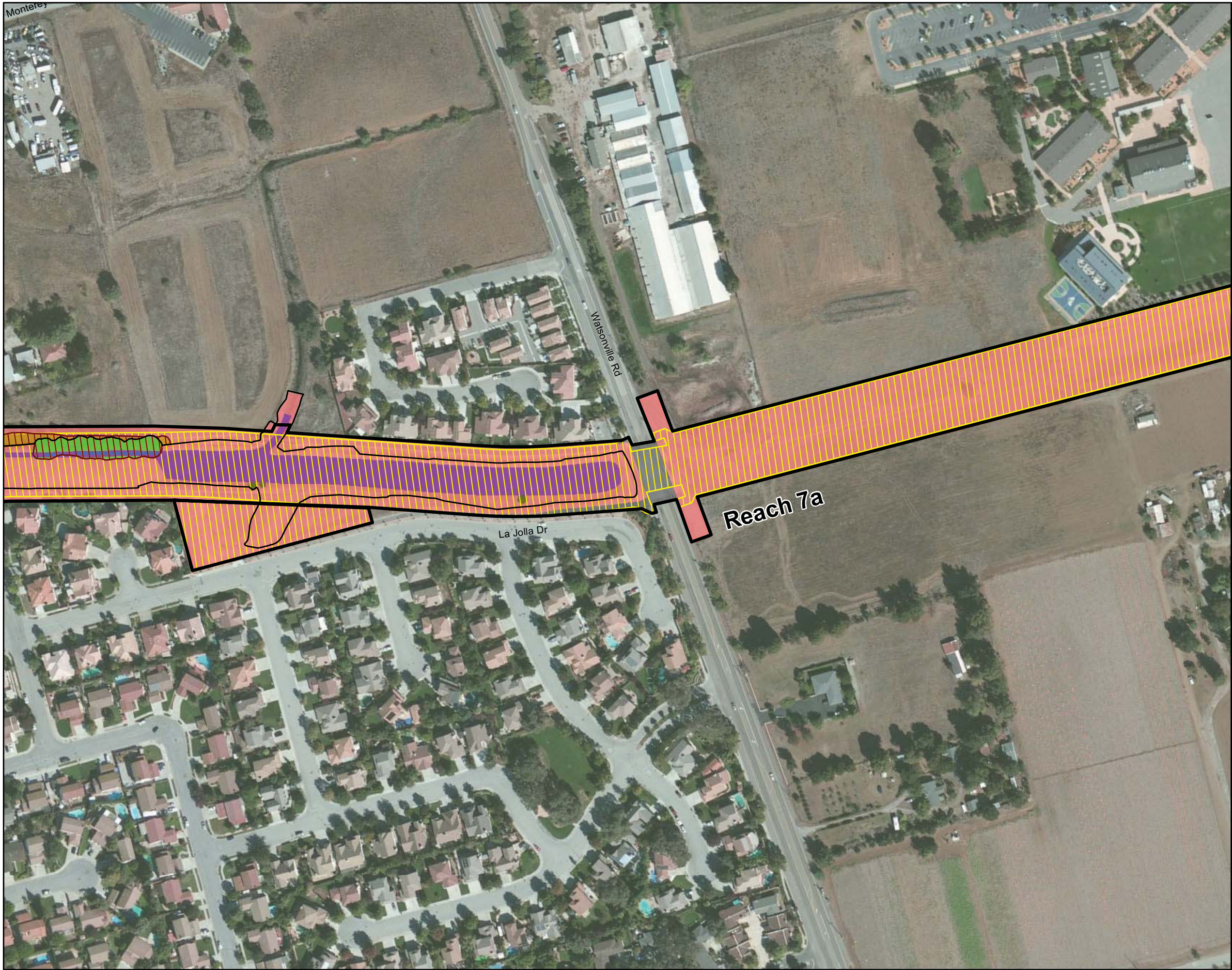
 0 125 250  
Scale in Feet













**Legend**

Reach Break 


Project Footprint 


CDFW Jurisdiction Boundary 

Temporary Impact 


Permanent Impacts 


**CAR Habitat Types**


Riparian Forest (PFO) 

Riparian Scrub-shrub (PSS) 


Perennial Emergent Marsh (PEM) 


Upland Forest/Woodland (UF/W) 

Upland Herbaceous (U/H) 

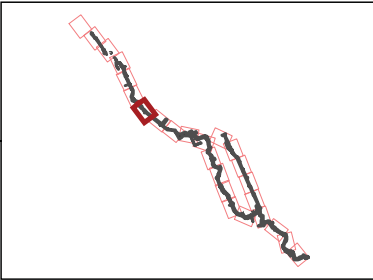
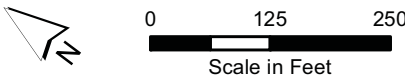
Upland Scrub (U/S) 

**Other Habitat Types**

Aquatic 

Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b














**Appendix E**  
**Impacts to Vegetation Types**  
**and Habitats for the**  
**Study Area**



**Legend**

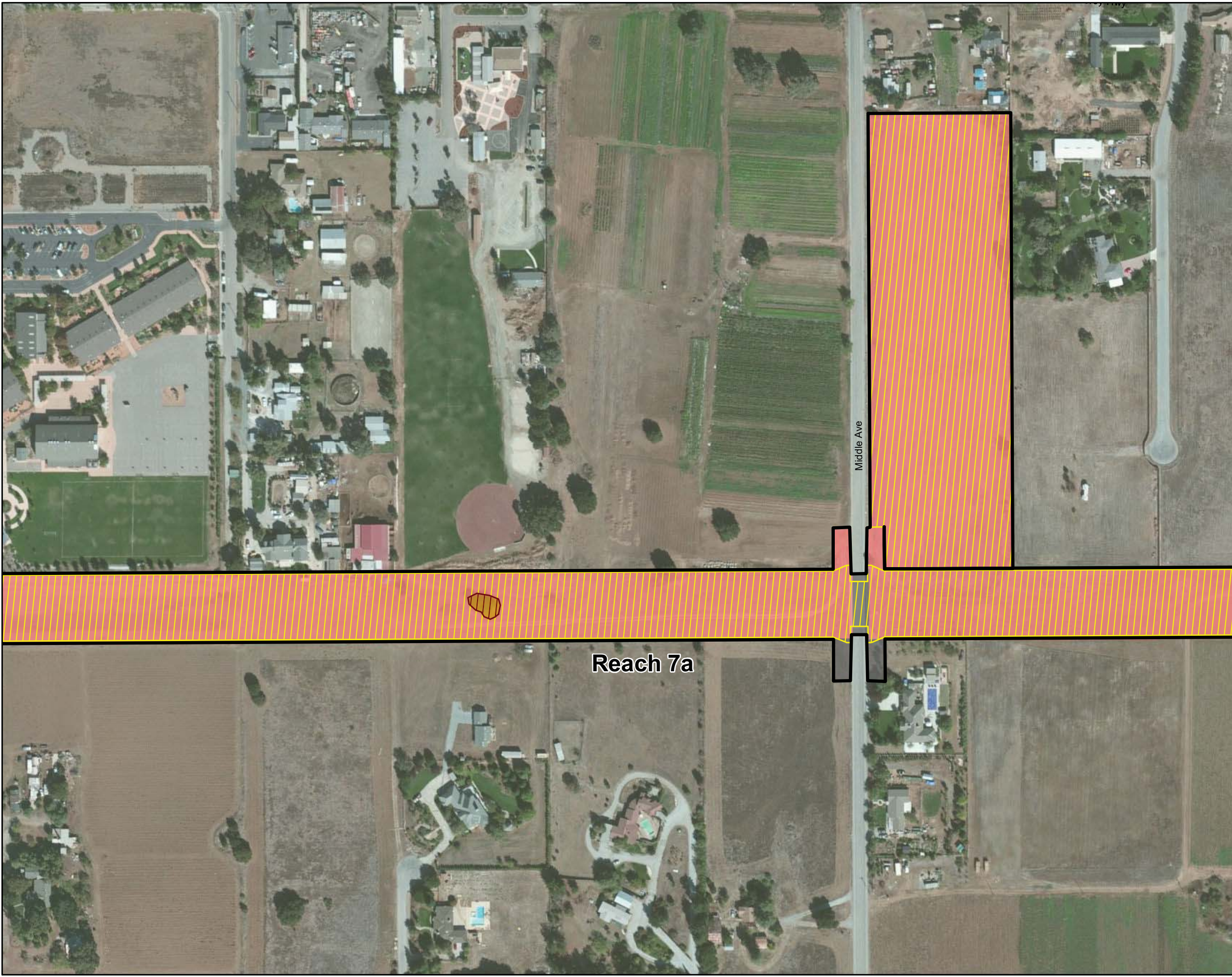
- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 

**CAR Habitat Types**

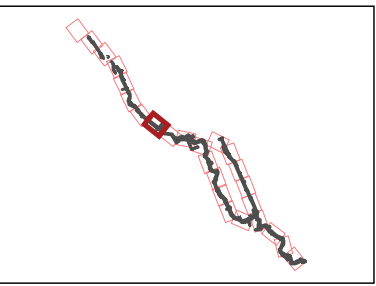
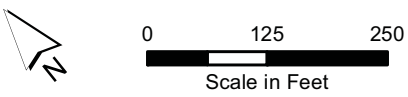
- Riparian Forest (PFO) 
- Riparian Scrub-shrub (PSS) 
- Perennial Emergent Marsh (PEM) 
- Upland Forest/Woodland (UF/W) 
- Upland Herbaceous (U/H) 
- Upland Scrub (U/S) 

**Other Habitat Types**

- Aquatic 
- Developed 



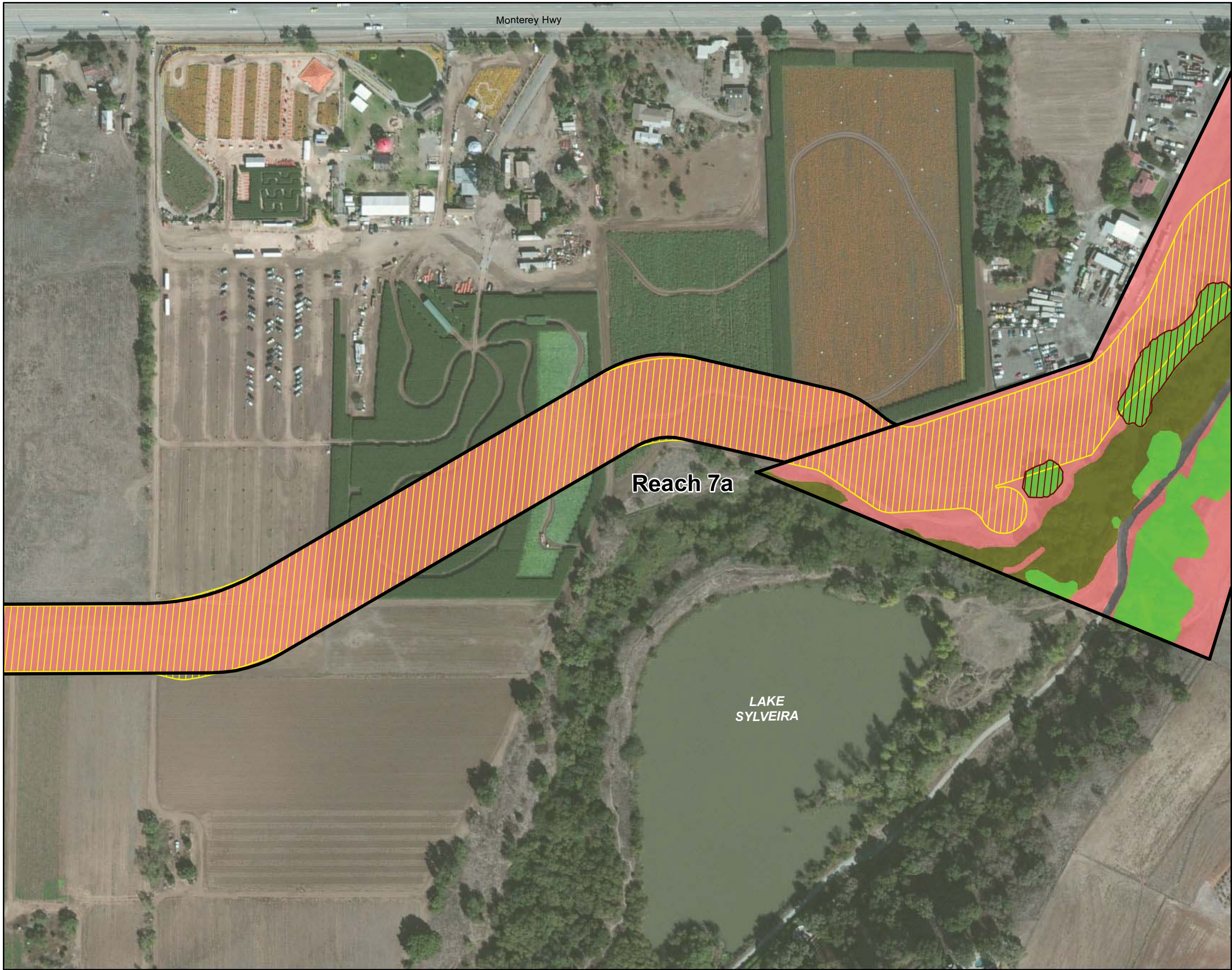
Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b



















**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 

**CAR Habitat Types**

- Riparian Forest (PFO) 
- Riparian Scrub-shrub (PSS) 
- Perennial Emergent Marsh (PEM) 
- Upland Forest/Woodland (UF/W) 
- Upland Herbaceous (U/H) 
- Upland Scrub (U/S) 

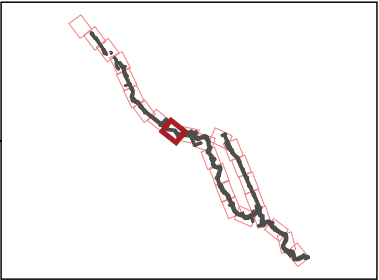
**Other Habitat Types**

- Aquatic 
- Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b



0 125 250  
Scale in Feet













**Legend**

Reach Break 


Project Footprint 


CDFW Jurisdiction Boundary 

Temporary Impact 


Permanent Impacts 


**CAR Habitat Types**


Riparian Forest (PFO) 

Riparian Scrub-shrub (PSS) 

Perennial Emergent Marsh (PEM) 


Upland Forest/Woodland (UF/W) 

Upland Herbaceous (U/H) 

Upland Scrub (U/S) 

**Other Habitat Types**

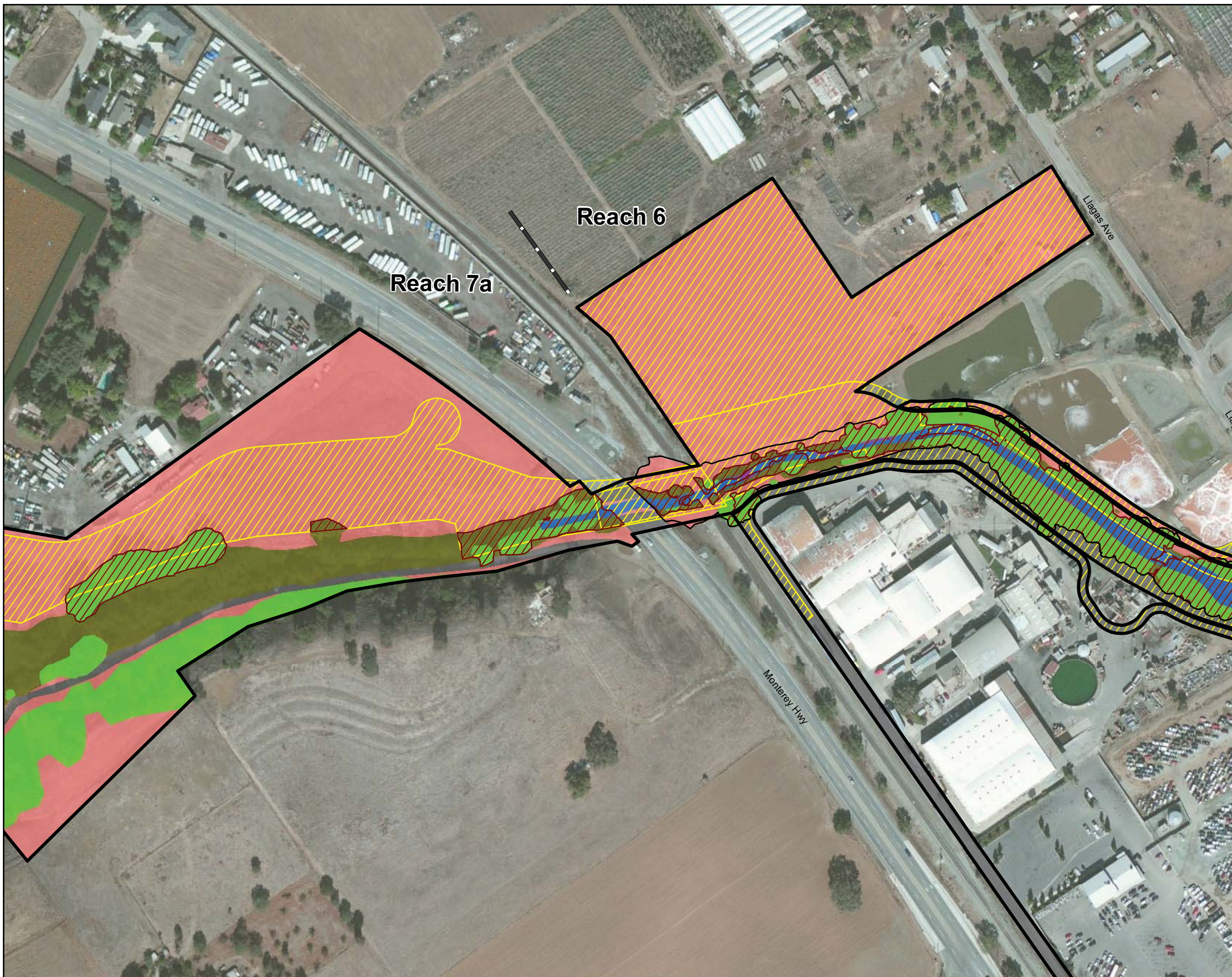
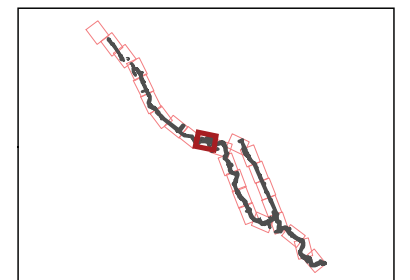
Aquatic 

Developed 

Imagery: Microsoft, 05/12/2010  
 Source: HT Harvey, 2013b



0 125 250  
 Scale in Feet


















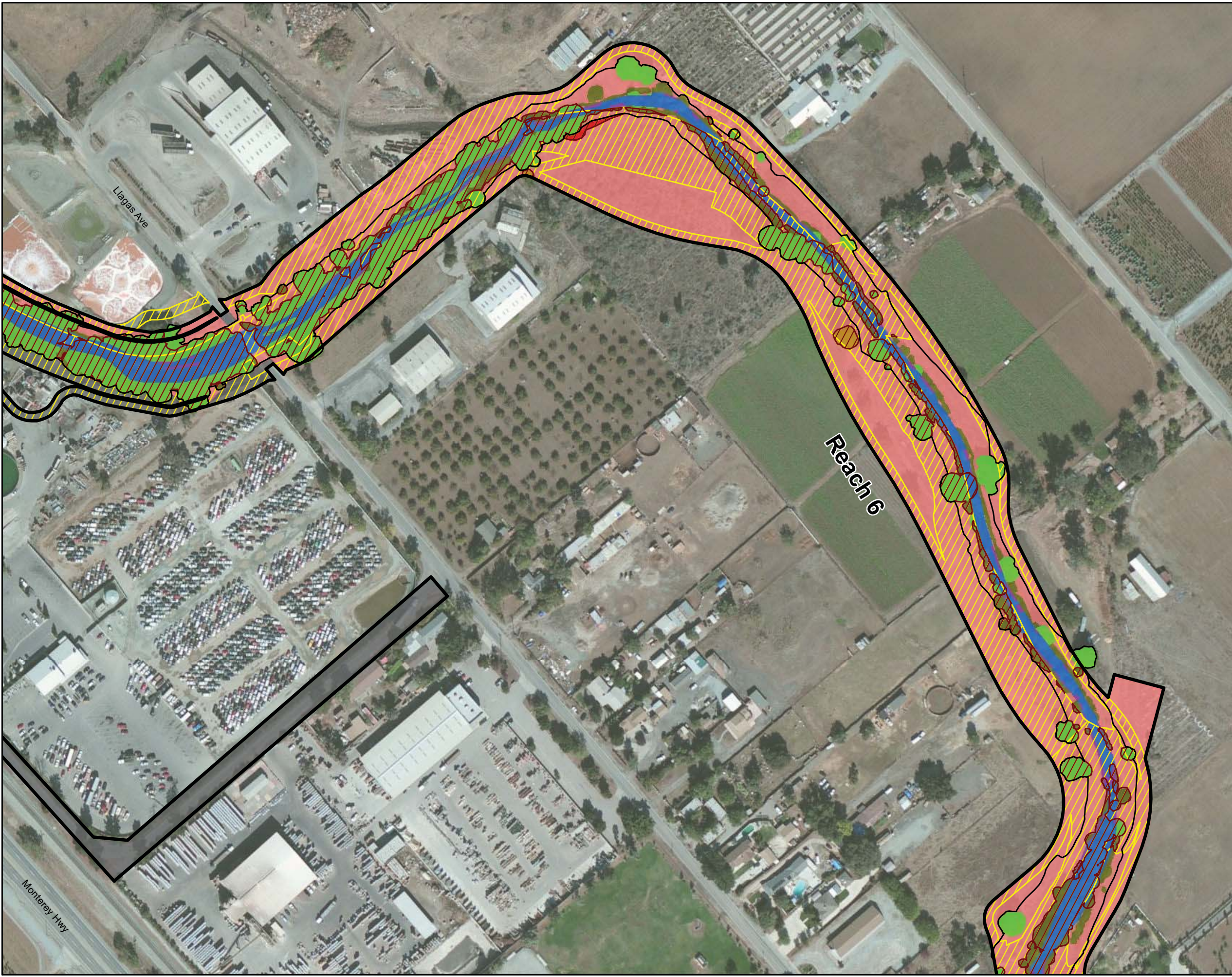
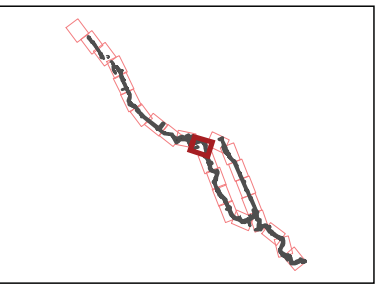
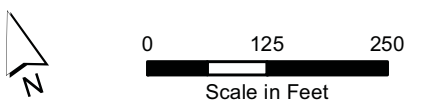




**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
- Riparian Forest (PFO) 
- Riparian Scrub-shrub (PSS) 
- Perennial Emergent Marsh (PEM) 
- Upland Forest/Woodland (UF/W) 
- Upland Herbaceous (U/H) 
- Upland Scrub (U/S) 
- Other Habitat Types**
- Aquatic 
- Developed 

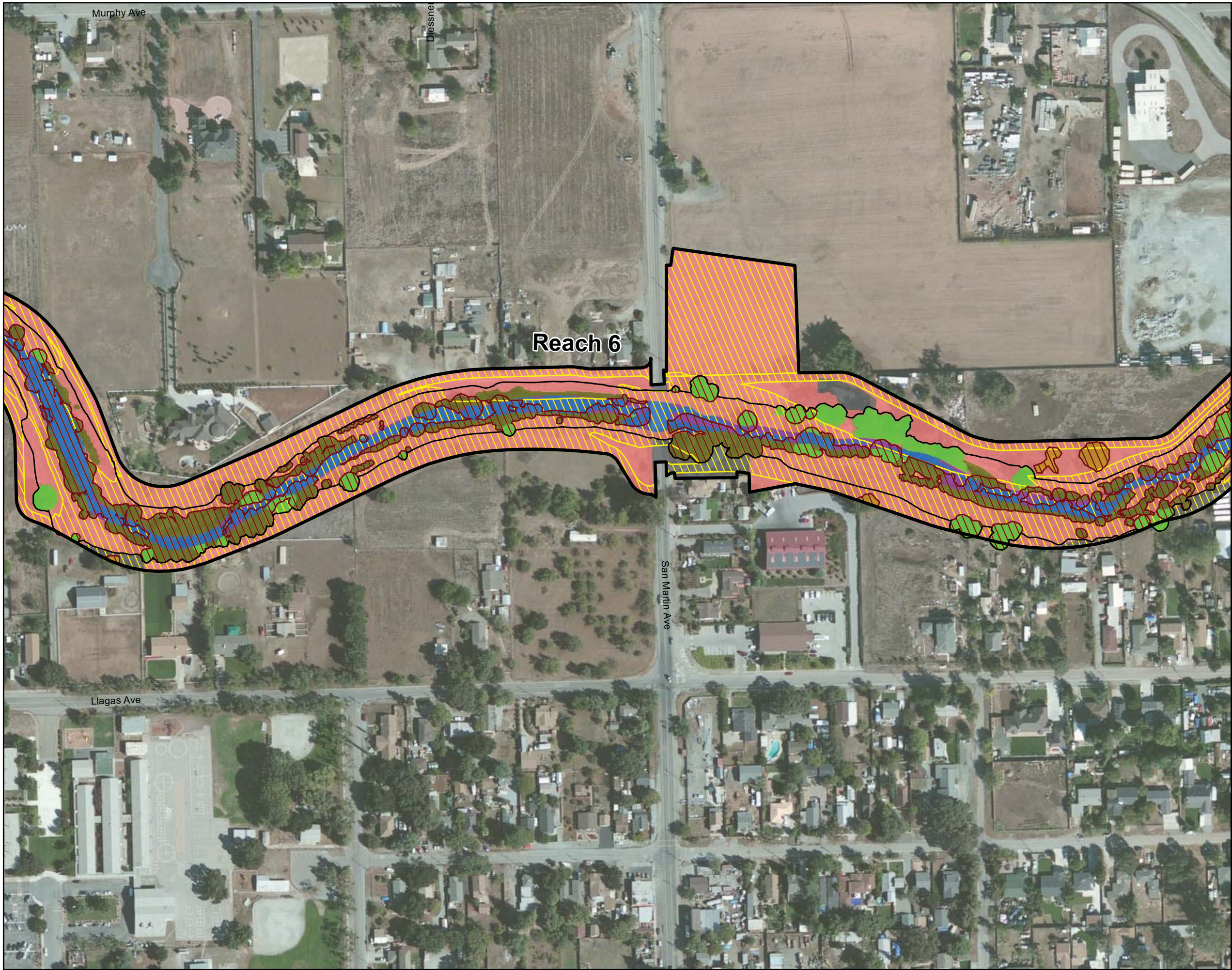
Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b



















**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 

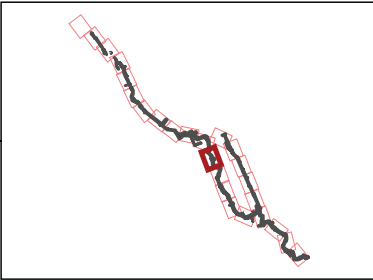
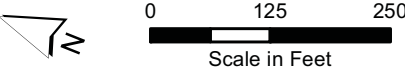
**CAR Habitat Types**

- Riparian Forest (PFO) 
- Riparian Scrub-shrub (PSS) 
- Perennial Emergent Marsh (PEM) 
- Upland Forest/Woodland (UF/W) 
- Upland Herbaceous (U/H) 
- Upland Scrub (U/S) 

**Other Habitat Types**

- Aquatic 
- Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b


















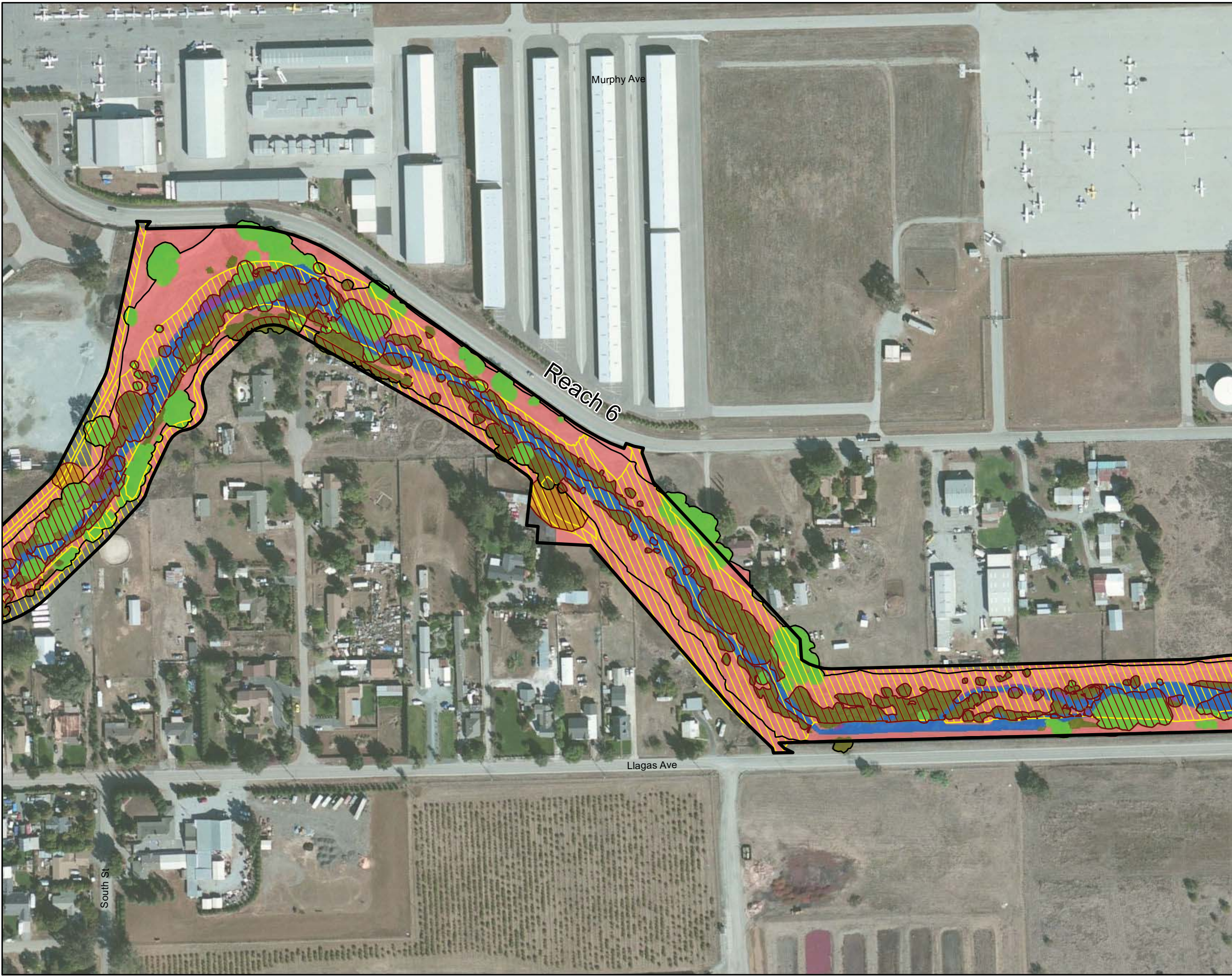
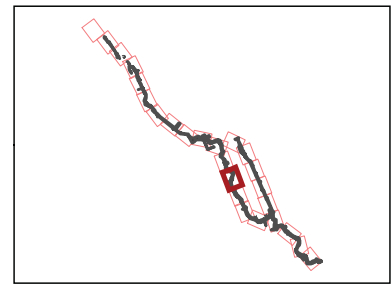
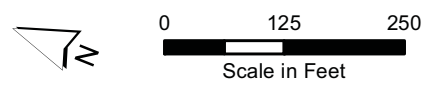




**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
  - Riparian Forest (PFO) 
  - Riparian Scrub-shrub (PSS) 
  - Perennial Emergent Marsh (PEM) 
  - Upland Forest/Woodland (UF/W) 
  - Upland Herbaceous (U/H) 
  - Upland Scrub (U/S) 
- Other Habitat Types**
  - Aquatic 
  - Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b
















**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 

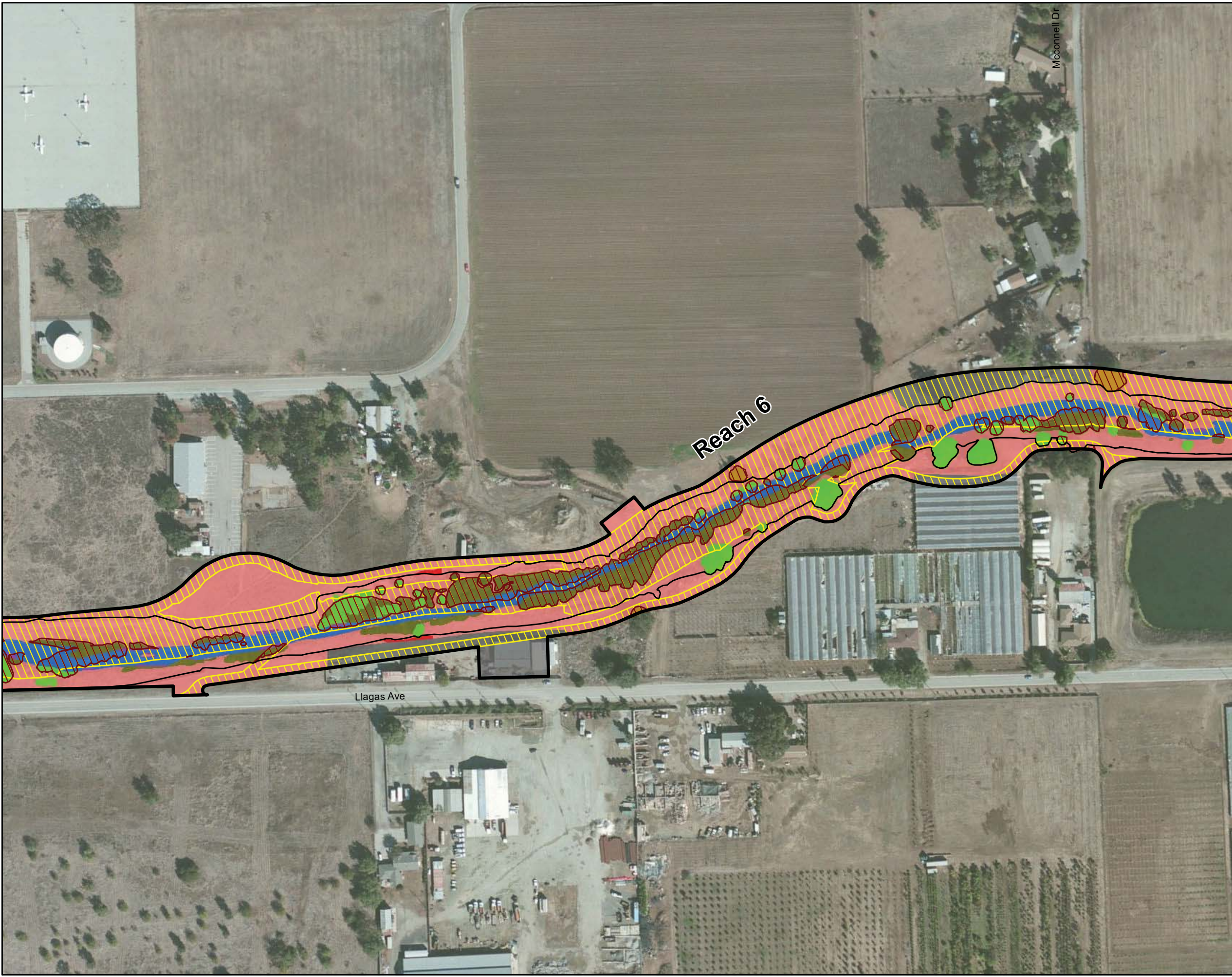
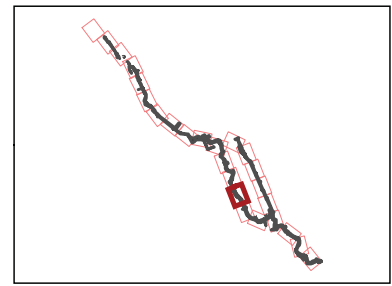
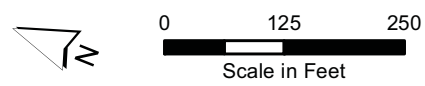
**CAR Habitat Types**

- Riparian Forest (PFO) 
- Riparian Scrub-shrub (PSS) 
- Perennial Emergent Marsh (PEM) 
- Upland Forest/Woodland (UF/W) 
- Upland Herbaceous (U/H) 
- Upland Scrub (U/S) 

**Other Habitat Types**

- Aquatic 
- Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b


















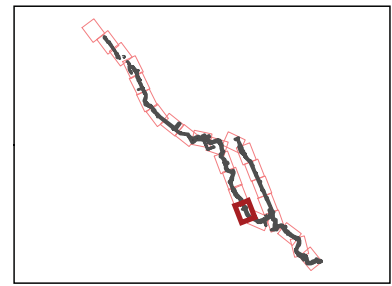




**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
- Riparian Forest (PFO) 
- Riparian Scrub-shrub (PSS) 
- Perennial Emergent Marsh (PEM) 
- Upland Forest/Woodland (UF/W) 
- Upland Herbaceous (U/H) 
- Upland Scrub (U/S) 
- Other Habitat Types**
- Aquatic 
- Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b



Santa Clara Valley  
Water District  
Percolation Ponds

Reach 6














Church Ave



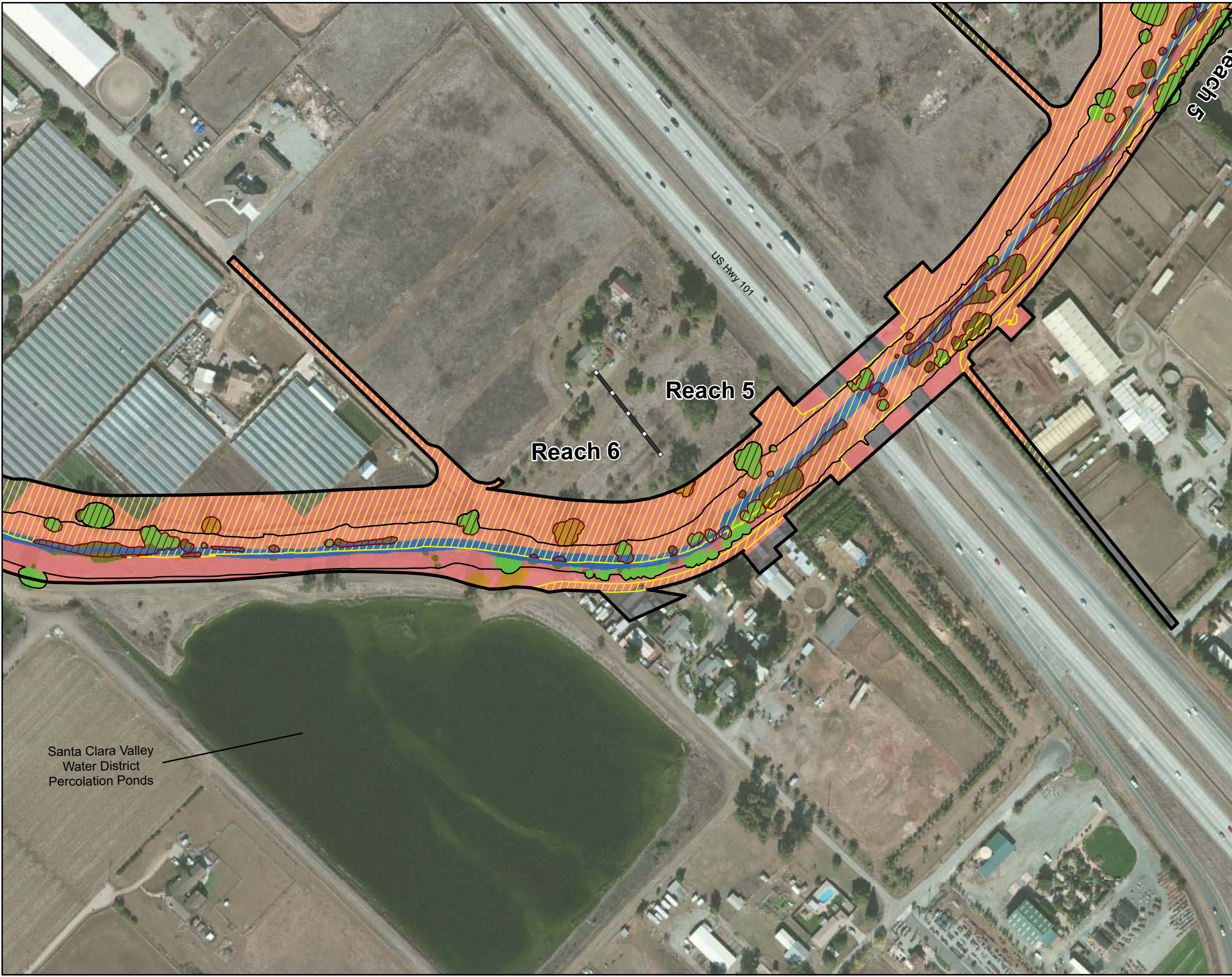
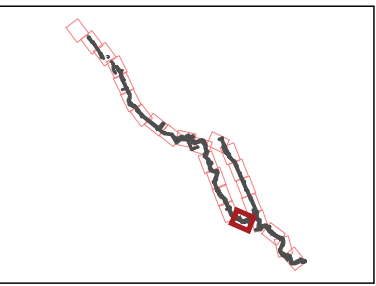
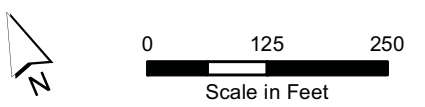




**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
  - Riparian Forest (PFO) 
  - Riparian Scrub-shrub (PSS) 
  - Perennial Emergent Marsh (PEM) 
  - Upland Forest/Woodland (UF/W) 
  - Upland Herbaceous (U/H) 
  - Upland Scrub (U/S) 
- Other Habitat Types**
  - Aquatic 
  - Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b


















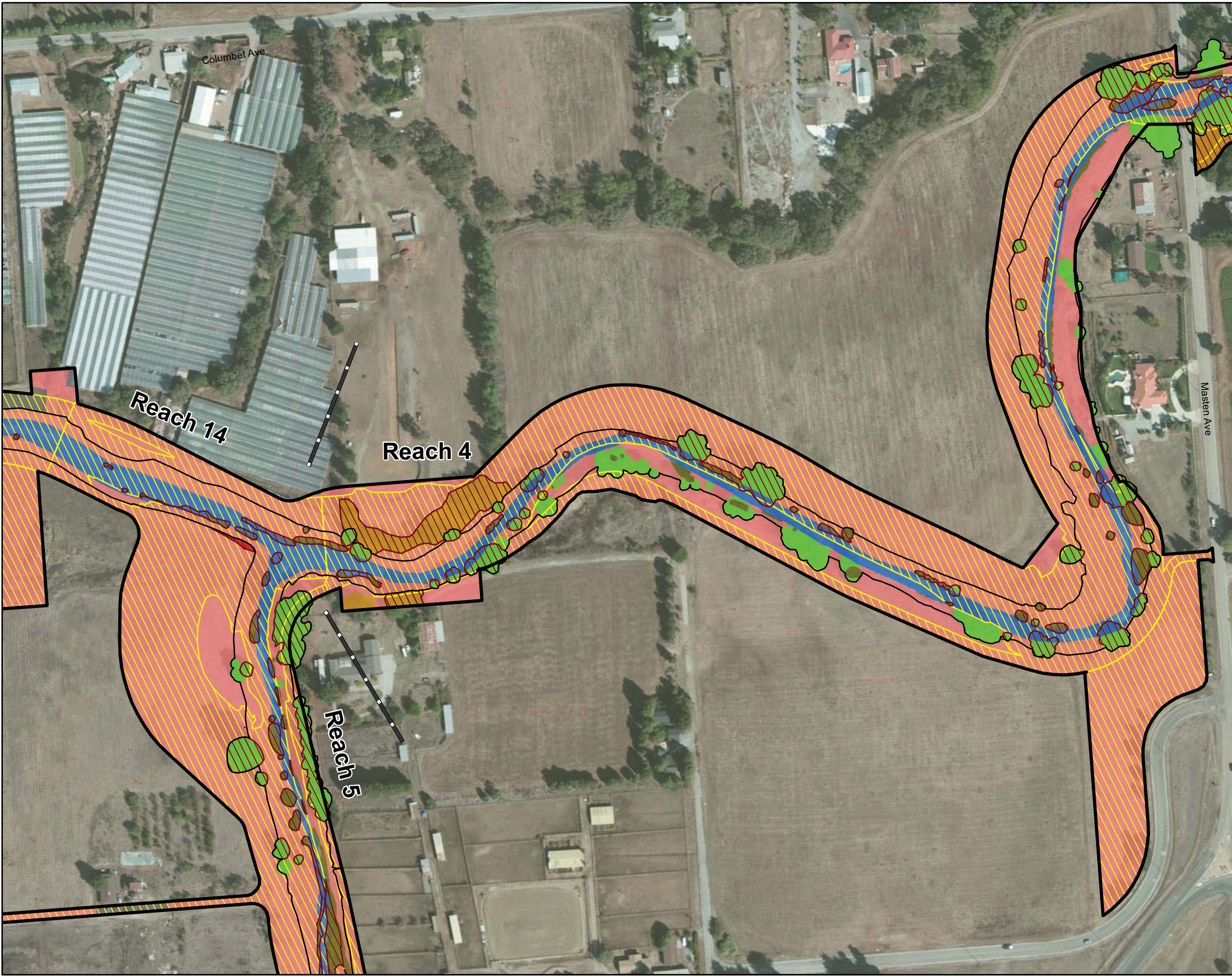
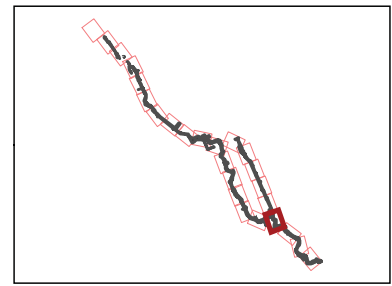
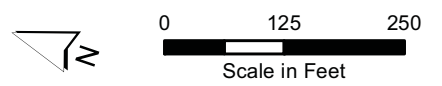




**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
  - Riparian Forest (PFO) 
  - Riparian Scrub-shrub (PSS) 
  - Perennial Emergent Marsh (PEM) 
  - Upland Forest/Woodland (UF/W) 
  - Upland Herbaceous (U/H) 
  - Upland Scrub (U/S) 
- Other Habitat Types**
  - Aquatic 
  - Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b


















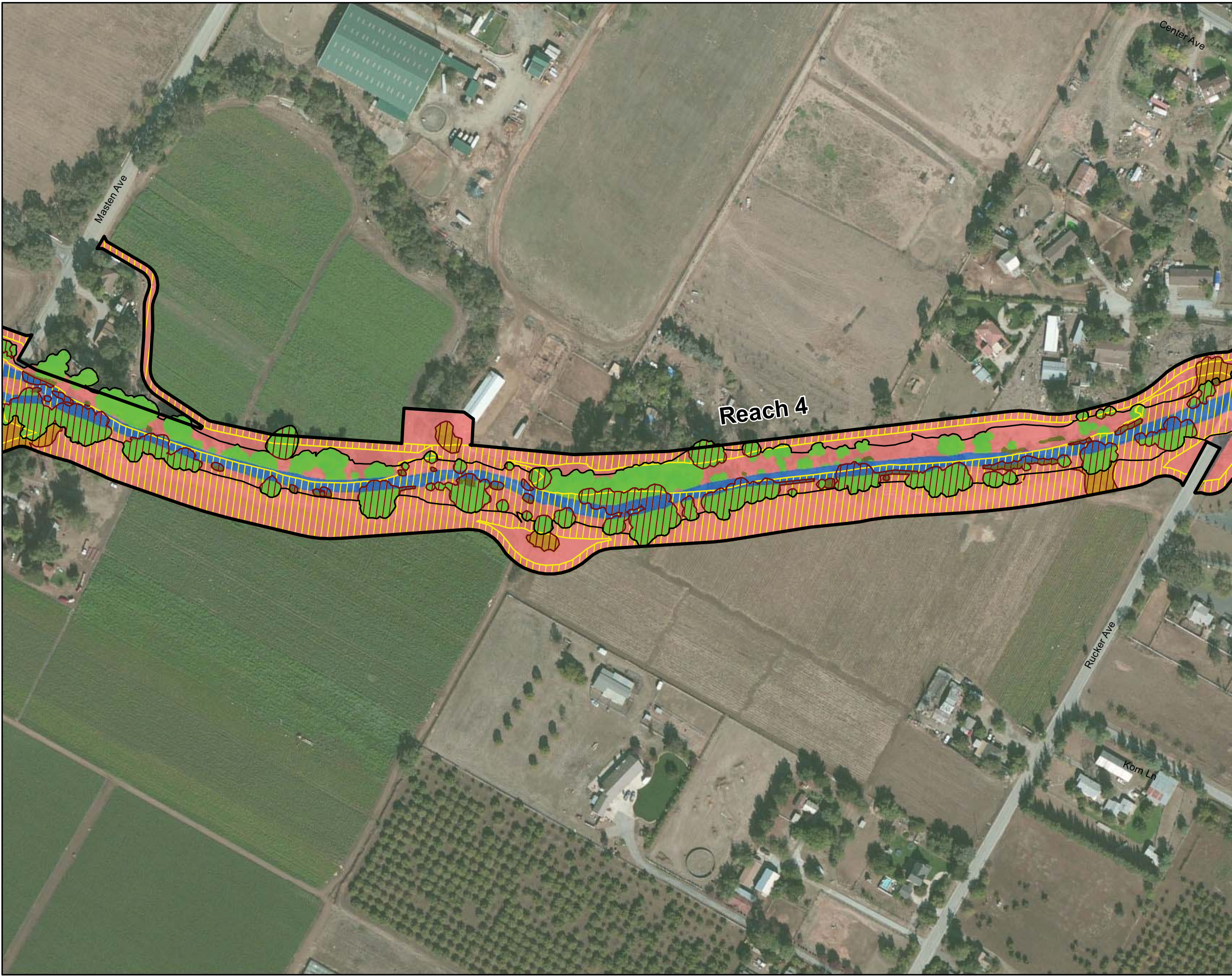
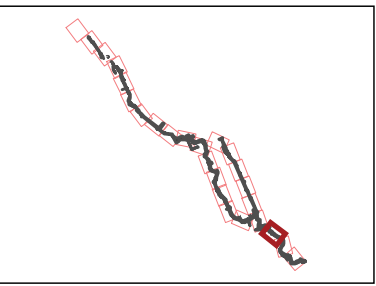
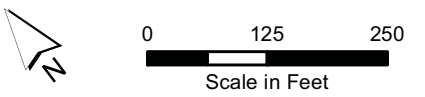




**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
  - Riparian Forest (PFO) 
  - Riparian Scrub-shrub (PSS) 
  - Perennial Emergent Marsh (PEM) 
  - Upland Forest/Woodland (UF/W) 
  - Upland Herbaceous (U/H) 
  - Upland Scrub (U/S) 
- Other Habitat Types**
  - Aquatic 
  - Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b













**Legend**

Reach Break 


Project Footprint 


CDFW Jurisdiction Boundary 

Temporary Impact 

Permanent Impacts 


**CAR Habitat Types**


Riparian Forest (PFO) 

Riparian Scrub-shrub (PSS) 

Perennial Emergent Marsh (PEM) 


Upland Forest/Woodland (UF/W) 

Upland Herbaceous (U/H) 

Upland Scrub (U/S) 

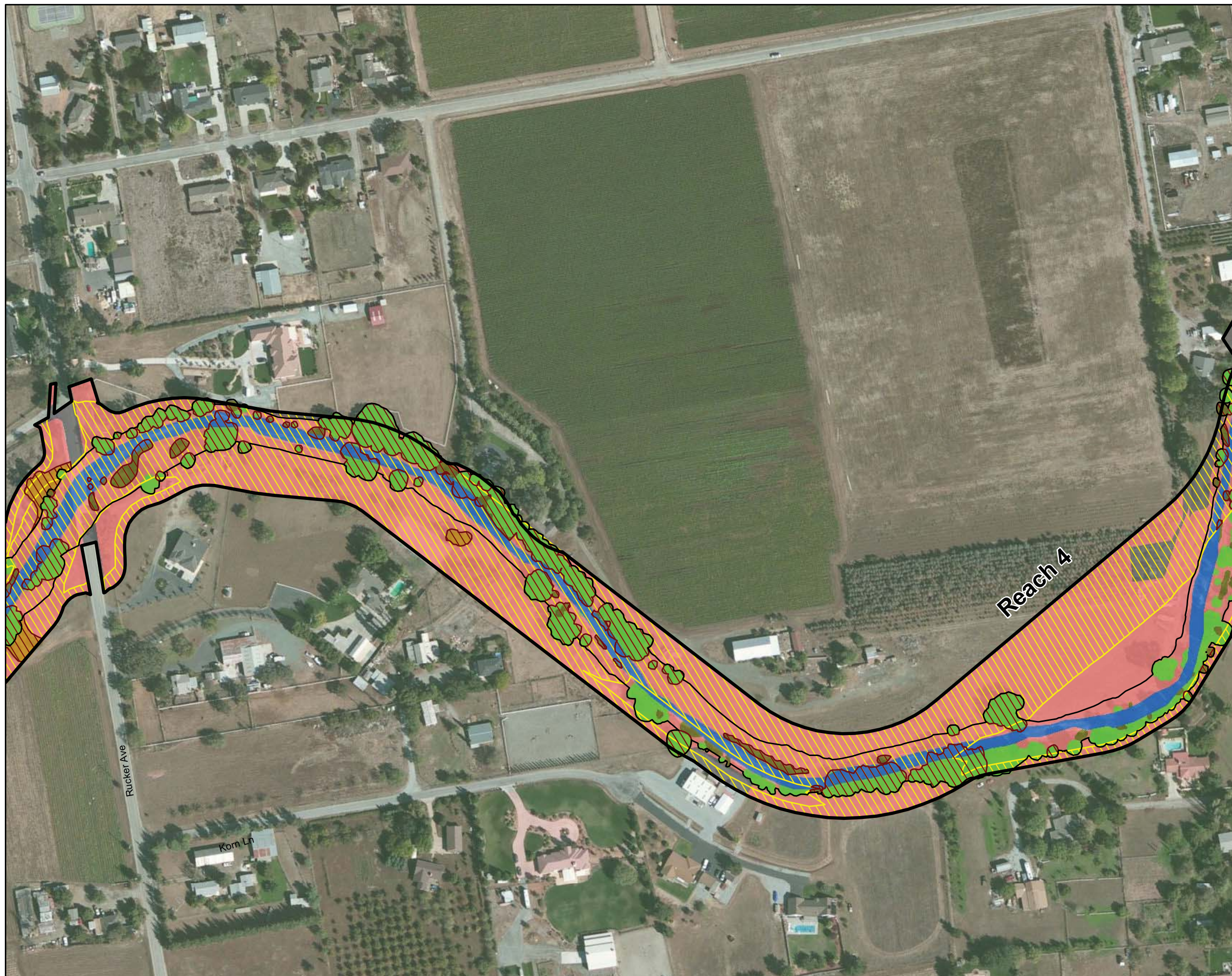
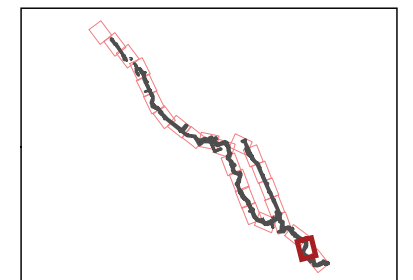
**Other Habitat Types**

Aquatic 

Developed 

Imagery: Microsoft, 05/12/2010  
 Source: HT Harvey, 2013b

0 125 250  
 Scale in Feet













**Legend**

Reach Break 


Project Footprint 


CDFW Jurisdiction Boundary 

Temporary Impact 

Permanent Impacts 


**CAR Habitat Types**


Riparian Forest (PFO) 

Riparian Scrub-shrub (PSS) 

Perennial Emergent Marsh (PEM) 

Upland Forest/Woodland (UF/W) 

Upland Herbaceous (U/H) 

Upland Scrub (U/S) 

**Other Habitat Types**

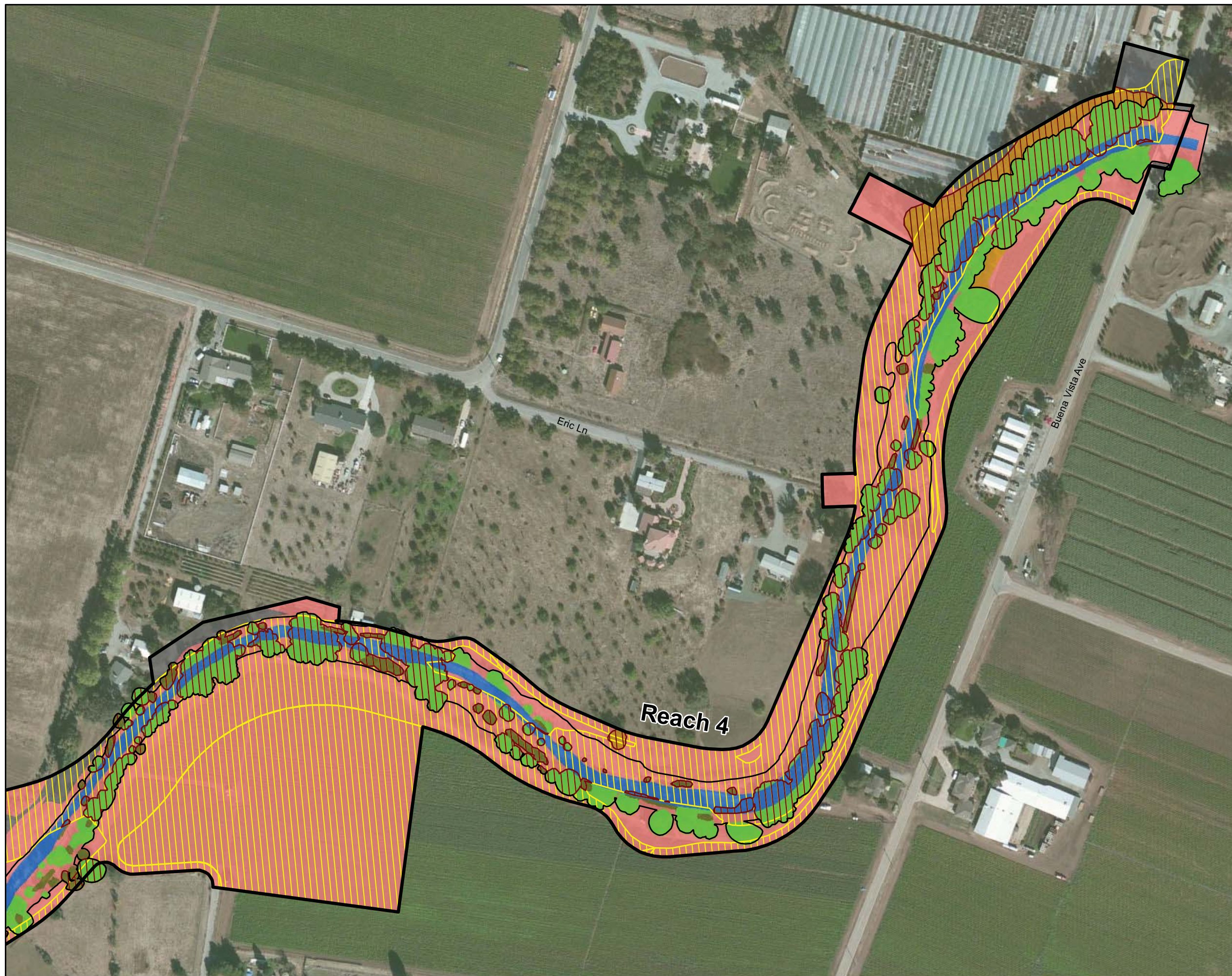
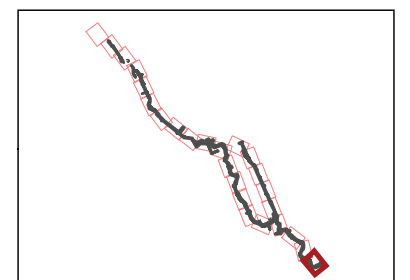
Aquatic 

Developed 

Imagery: Microsoft, 05/12/2010  
 Source: HT Harvey, 2013b



0 125 250  
 Scale in Feet


















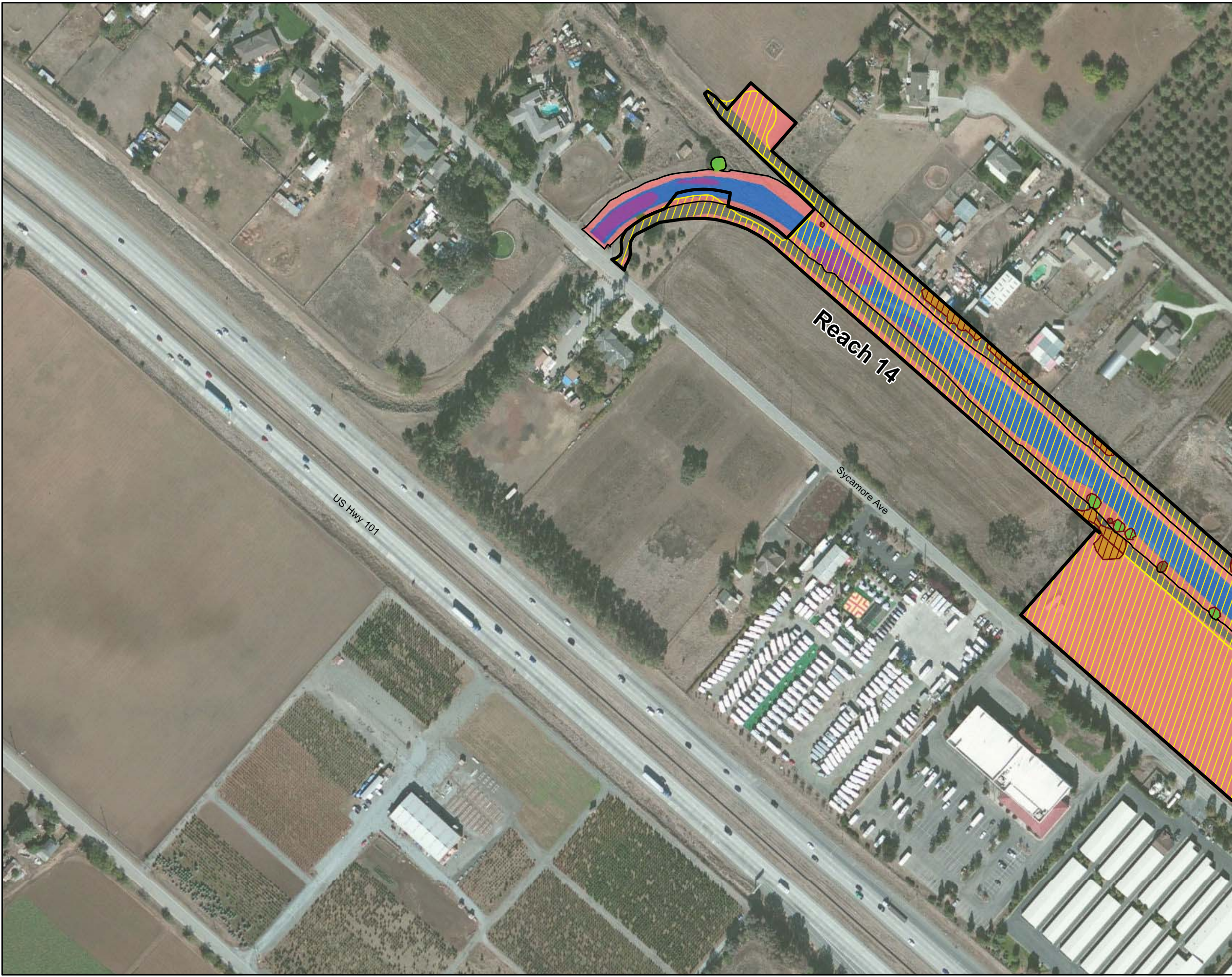
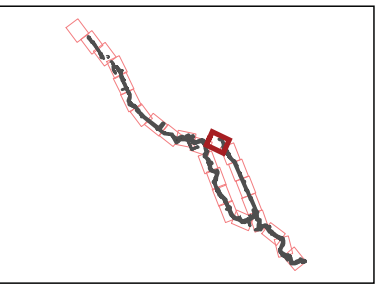
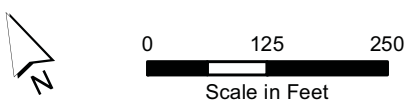




**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 
- CAR Habitat Types**
  - Riparian Forest (PFO) 
  - Riparian Scrub-shrub (PSS) 
  - Perennial Emergent Marsh (PEM) 
  - Upland Forest/Woodland (UF/W) 
  - Upland Herbaceous (U/H) 
  - Upland Scrub (U/S) 
- Other Habitat Types**
  - Aquatic 
  - Developed 

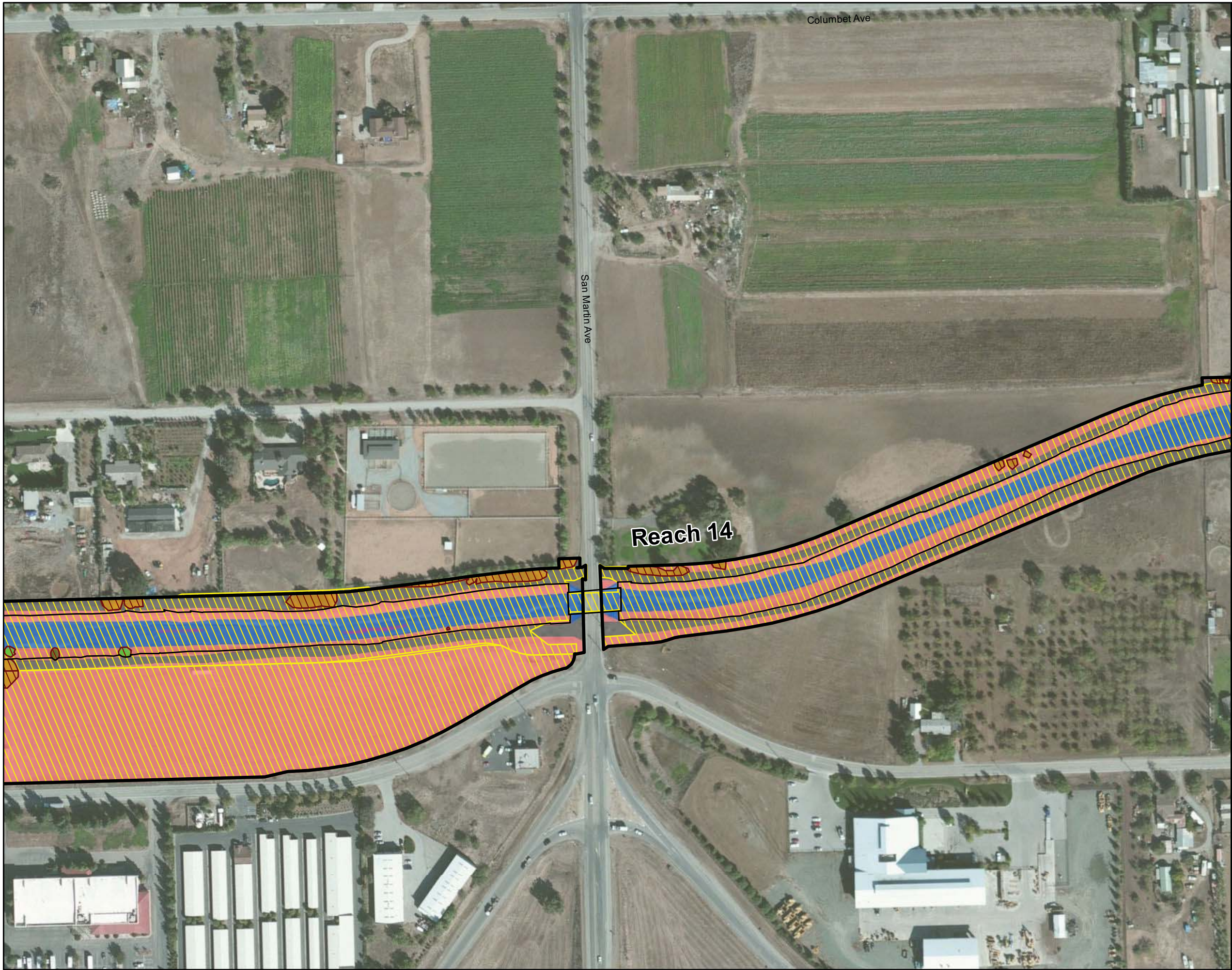
Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b













**Legend**

Reach Break 


Project Footprint 


CDFW Jurisdiction Boundary 

Temporary Impact 

Permanent Impacts 


**CAR Habitat Types**


Riparian Forest (PFO) 

Riparian Scrub-shrub (PSS) 


Perennial Emergent Marsh (PEM) 


Upland Forest/Woodland (UF/W) 

Upland Herbaceous (U/H) 

Upland Scrub (U/S) 

**Other Habitat Types**

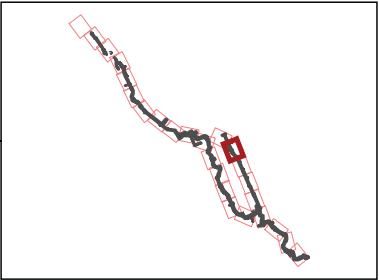
Aquatic 

Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b



0 125 250  
Scale in Feet














**Appendix E**  
**Impacts to Vegetation Types**  
**and Habitats for the**  
**Study Area**



**Legend**

- Reach Break 
- Project Footprint 
- CDFW Jurisdiction Boundary 
- Temporary Impact 
- Permanent Impacts 

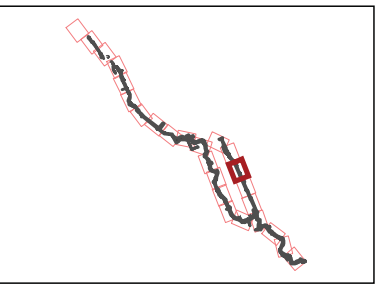
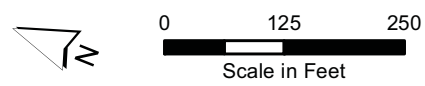
**CAR Habitat Types**

- Riparian Forest (PFO) 
- Riparian Scrub-shrub (PSS) 
- Perennial Emergent Marsh (PEM) 
- Upland Forest/Woodland (UF/W) 
- Upland Herbaceous (U/H) 
- Upland Scrub (U/S) 

**Other Habitat Types**

- Aquatic 
- Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b













**Appendix E**  
**Impacts to Vegetation Types**  
**and Habitats for the**  
**Study Area**


**Legend**

Reach Break 


Project Footprint 


CDFW Jurisdiction Boundary 

Temporary Impact 

Permanent Impacts 


**CAR Habitat Types**


Riparian Forest (PFO) 

Riparian Scrub-shrub (PSS) 


Perennial Emergent Marsh (PEM) 


Upland Forest/Woodland (UF/W) 

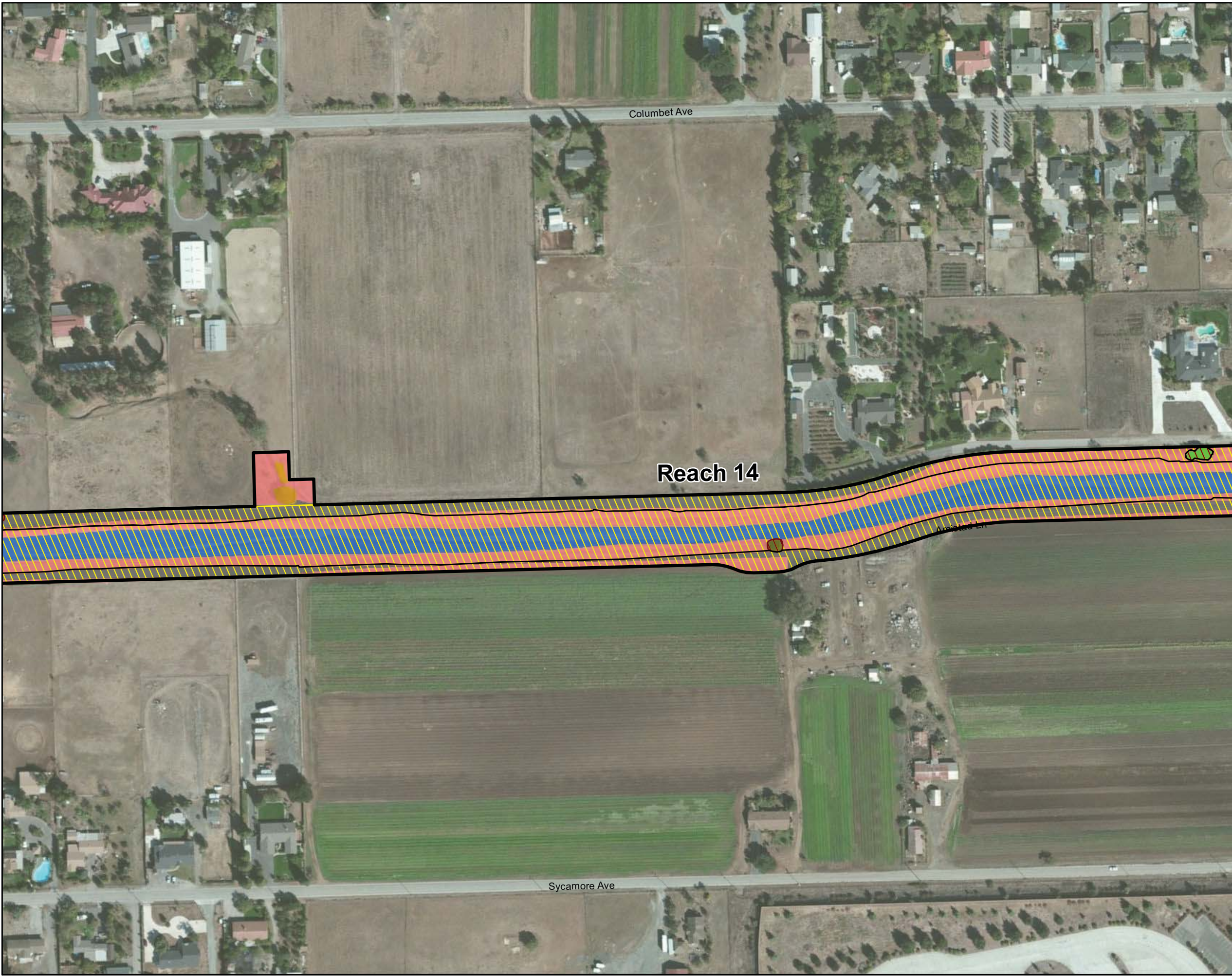
Upland Herbaceous (U/H) 

Upland Scrub (U/S) 

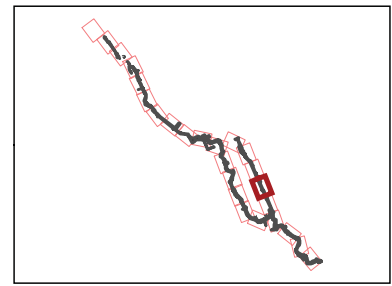
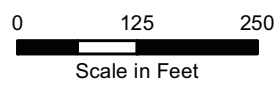
**Other Habitat Types**

Aquatic 

Developed 



Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b













**Appendix E**  
**Impacts to Vegetation Types**  
**and Habitats for the**  
**Study Area**


**Legend**

Reach Break 


Project Footprint 


CDFW Jurisdiction Boundary 

Temporary Impact 

Permanent Impacts 


**CAR Habitat Types**


Riparian Forest (PFO) 

Riparian Scrub-shrub (PSS) 


Perennial Emergent Marsh (PEM) 


Upland Forest/Woodland (UF/W) 

Upland Herbaceous (U/H) 

Upland Scrub (U/S) 

**Other Habitat Types**

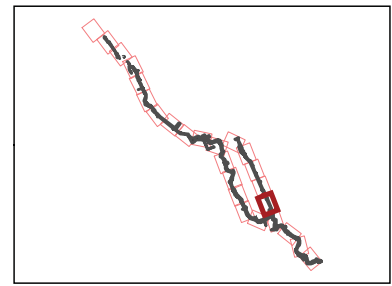
Aquatic 

Developed 

Imagery: Microsoft, 05/12/2010  
Source: HT Harvey, 2013b



0 125 250  
Scale in Feet









## 2 Response to Comments

### 2.1 List of Commentors

The following list shows the oral comments and letters that were received by the Santa Clara Valley Water District (SCVWD). The SCVWD received 10 letters commenting on the Draft EIR. This tabulation is followed by copies of the 10 letters and the public meeting transcripts (Attachment A). Commentors were assigned identification numbers of 1–7. Letters are coded with initials of the commentor or agency. Each individuals' comments within a letter was assigned a number starting at 1. Each comment is coded with a combination of the commentor, identification, and the comment number. For example, the comment code MM-1 is the first comment in the Mike Monroe Letter.

**Table 2-1 Comments Received on Draft EIR**

Letter #	Name	Agency / Organization	Date
<b>Oral Comments / Public Hearing Meeting</b>			
1	Dale Jelsema		January 15, 2014
2	Virginia Anacleto		January 15, 2014
3	Amy Lawrence		January 15, 2014
4	Janet Tuttle		January 15, 2014
5	Laura Chanjaran		January 15, 2014
6	Robert Cerruti		January 15, 2014
7	Robert Redfern		January 15, 2014
<b>Comments Letters</b>			
RR	Robert Redfern		January 15, 2014
LH	Linda Hayes		January 24, 2014
DJ-I	Dale Jelsema		February 18, 2014
DJ-II	Dale Jelsema		February 17, 2014 February 19, 2014
MM	Mike Monroe		February 19, 2014
CALTRANS	Erik Alm, AICP District Branch Chief	California Department of Transportation	February 19, 2014
CCRWQCB	Kenneth A. Harris, Jr. Executive Officer	Central Coast Regional Water Quality Control Board	February 25, 2014
CDFW	Scott Wilson, Regional Manager Bay Delta Region	California Department of Fish and Wildlife	February 14, 2014
NMFS	Irma Lagomarsiso Assistant Regional Administrator California Coastal Area Office	National Oceanic and Atmospheric Administration	February 26, 2014
VTA	Roy Molseed Senior Environmental Planner	Santa Clara Valley Transportation Authority	February 19, 2014

### 2.1.1 Comment Card RR

#### 3. How would you rate the handouts provided and exhibits displayed, if applicable?

☒ Excellent ☐ Good ☐ Fair ☐ Poor ☐ n/a

#### 4. How would you rate the overall meeting performed by the water district?

☐ Excellent ☒ Good ☐ Fair ☐ Poor ☐ n/a

#### 5. Any comments or compliments?

The large scale drawings of the Silveira Lake plans were very good. I did not realize the "Lake" (more like a pond) is a result of an effort to dig up gravel at the site some years back, which resulted in Llagas Creek waters backing up onto Monterey Rd at Watsonville Rd.

Speaking of that flood-prone intersection, it seems odd to me that the intersection was recently improved, but the culvert underneath it was not sufficiently enlarged to carry away flood waters, as mentioned at the meeting.

#### 6. Any concerns or complaints?

The alternative plan that you considered and rejected were given short shrift, including one that involved shunting flood waters over to the area East of 101. I looked up the DEIR and could not find an alternate plan that involved moving water over to the other side of 101.

The plan did not discuss how the build up of silt would be dealt with after the project is built. The existing creek & infrastructure did not take this into account.

**In order for water district staff to personally respond to issues you have raised, your contact information is needed. Please provide:**

(please write legibly)

**Name:** Robert J. Redfern

**Address:** 14721 Excaliber Dr., Morgan Hill CA 95037

**Phone:** 408 782 0833

**E-mail:** rredfern@charter.net

If you have questions about this survey, please contact  
Customer Relations at  
**(408) 630-2000.**

© 2013 Santa Clara Valley Water District • 7/13 EM



## 2.1.2 Email LH

**From:** [twhgilroy@starband.net](mailto:twhgilroy@starband.net)  
**To:** [Michael Martin](#)  
**Subject:** Upper Llagas Creek Flood Protection Project - DEIR  
**Date:** Friday, January 24, 2014 11:54:54 AM

---

This message relates to the above referenced subject and, more specifically, to our property located at 1085 Denio Avenue, Gilroy; APN 835-12-026. We are aware of the proposal to acquire a portion of our property in the interest of realigning the Llagas Creek channel and constructing the associated maintenance road.

Our concern relates to the ultimate disposition of a very large, extremely old heritage Valley Oak tree located where our property line meets the creek bank. The tree in question currently bears two tags which read 3094 and 3095. This stately tree is probably one of a kind in this particular reach of the water course and represents a noteworthy asset to our property. Virtually every visitor remarks as to its prominence and historical significance as it probably dates back in time comparable to the age of our home (101 years).

It has recently been brought to our attention that a number of trees are scheduled for removal as a function of this project and we wish to go on record in strong opposition to any plans to eliminate this tree. As we understand it, the realignment project will leave this portion of the creek intact, ostensibly to be used simply as an overflow channel running parallel to the proposed new channel. No improvements are scheduled to the existing channel which further supports the premise that existing vegetation should remain undisturbed in the interest of bank stabilization and retention of valuable botanical resources. If this particular tree is not scheduled for removal, we would greatly appreciate your firm affirmation of that fact.

In the interest of solidifying our argument, we believe it would be instructive for you to visit the site and witness first-hand the Valley Oak of which we speak. If that is possible, we may be reached at 408-842-4051 virtually any day of the week.

We look forward to your acknowledgment of this communication.

Yours truly,

Trevor Hayes

Linda Hayes=

### 2.1.3 Email DJ-I

**From:** [michaelmartin@valleywater.org](mailto:michaelmartin@valleywater.org)  
**To:** [Mitchell Katzel](#); [Christie A Robinson](#)  
**Subject:** Upper Llagas Comments  
**Date:** Tuesday, February 18, 2014 7:56:22 AM

---

#### **You have received 1 file.**

Use the secure links below to download.

Mitchell / Christie

Late Friday we received two more comments. The first is copied below, the second is attached from CDFW.

I am reviewing the Upper Llagas DEIR. SCVWD is proposing to purchase some of my land for so-called maintenance road. I can't find any DEIR section that addressed how the SCVWD will provide nighttime security or road patrols of these new roads. These new road will provide access to ATVs, Jeeps, etc and their drivers to now enter our barns, outbuilding, etc to steal or damage equipment, etc. How is the DEIR and SCVWD going to address this hot item??  
Sincerely, Dale Jelsema, have lived along the creek for 33+ years. .



## 2.1.4 Access Valley Water DJ-I

### Comments from Dale Jelsema

#### Submitted via Access Valleywater 2/17 and 2/19/2014

I am reviewing the Upper Llagas DEIR. SCVWD is proposing to purchase some of my land for so-called maintenance road. I can't find any DEIR section that addressed how the SCVWD will provide nighttime security or road patrols of these new roads. These new road will provide access to ATVs, Jeeps, etc and their drivers to now enter our barns, outbuilding, etc to steal or damage equipment, etc. How is the DEIR and SCVWD going to address this hot item??

Sincerely, Dale Jelsema, have lived along the creek for 33+ years. . (496)

Correction to Upper Llagas DEIR - section 3.14.2.2 Utilities, subset Water Wells. Need to add another well (new total of 12), that is within 20 feet of the creek. This well was drilled in 1940's time period. It is owned and on SCVWD land - parcel number 835-12-019. This well is currently not used, and shows on SCVWD well maps as being destroyed. However, I can connect my tractor PTO to the well head, and pump approx. 40-50 gpm. This well is NOT sealed, and meets NONE of the SCVWD's own rules and requirements, and is a hazard to the local neighbor well systems. I have brought this issue to the SCVWD for over 30 yrs, since the well is on YOUR land, but each time I am told that the well does not exist. This well is in the path of your proposed maintenance road. Since the SCVWD currently cannot get to this land locked parcel, I will give permission to SCVWD to get a well removal company to use my road and cross my land to get rid of this well and seal the well site to your own well standards.

Sincerely,

Dale Jelsema, 1045 Malo Ct, right next to this well, which I understand is drilled to approx. 240 feet. (519)

Upper Llagas DEIR - section 3.14.2.3 - Public Services - Fire and Police Protection. The nice new wide and level maintenance roads are going to draw a lot of ATVs, motorcycles, bikers, and night time beer drinkers!! Over my 33+ yrs of living along Llagas creek Reach 4, we already have some of these folks, but since they must travel within the rocky creek bottom, there are only a few of these folks each month (more in the summer months).

In Reach 4, now that they will have top of the creek bank access to these roads, the risk of them starting fires on the ranch lands, creekside grasses, etc from smoking, etc, plus now top of the bank access to survey our barns, outbuildings, homes, etc, our risk of theft and damage to equipment, trucks, etc goes WAY UP!!

What is SCVWD doing to address this? The DEIR doesn't seem to address this issues. Will SCVWD have security personal, a 24 hr hotline, etc?? DO NOT tell us to contact the local Sheriff - - they usually only have 2-3 people on duty at night to cover from Mount Madona to east foothills, and South San Jose to almost Hollister. They will NOT respond - telling us this is SCVWD land, and NOT part of their support duty. For the past 33+ yrs, we usually just arm ourselves, and try to handle the issue, but with the large future increase in non-local people using these new roadways for illegal use (mainly at nite), and now getting to be almost 70, this should NOT be my problem since the SCVWD is creating it! What is your answer? On the subject of increased fire problems, will Cal Fire have keys to open the access gates to these new roadways? (520)

input to Upper Llagas DEIR - section 3.15.3.3 - subset South County Joint Area Plan Policies. Then under "Open Space and Recreation SC 16.12", the DEIR says proposed trails along Llagas, Uvas, . . . . . should be connected to the rest of the countywide trail system"

This statement is very much a concern with the Reach 4 property owners! We DO NOT want the new maintenance road to be used as the start of a new future trail system, mainly due to fire, theft, and property trespassing issues. This section should be updated to comment that Reach 4 roadways are NOT to be part of any county trail system. Many gates need to be installed on the proposed new SCVWD maintenance roads to limit usage to just SCVWD trucks. (521)

In reviewing the Llagas DEIR, in Reach 4 from Rucker Ave to the proposed new maintenance road connecting to Denio Ave, over 350 trees along the creek are scheduled to be cut down. Many of these are Coastal Live Oaks, Valley Oaks, etc. Yes, and understand that some trees need to be cut for this project. BUT in some parts of your project, whole creek banks are being clear cut of ALL trees. Is this needed to this extent? Has Calif and County Fish and Game totally signed off on this? Some of the Fish and Game letters on file with the DEIR, question the number of shaded creek pools that will now be exposed? Have answers been given to the Fish and Game folks? Many of these trees are over 100 to 150 years old. As a creek side property owner for the past 33 years, I have spend many afternoons enjoying the shade of some of these trees, while watching the waters flow down the creek. In many cases, your proposed roads can be build and pass under these 80+ foot high trees, without the need of these trees being cut down. I know the SCVWD does not need firewood, so why the clear cutting of both creek banks along Reach 4? As more and more neighbors learn of this, I do believe that you are going to have lots of negative feels about your project - including myself. Please rethink this whole tree clear cutting theory. Just replacing a 80+ foot high and over 100+ year old tree with 4 or 5 new 7 foot high trees just does not make sense. Plus, NONE of you or us neighbors will ever live to see any new 7' high trees grow into a 80 foot height.

Sincerely,

Dale Jelsema (539)

### 2.1.5 Email MM

**From:** [Michael Martin](#)  
**To:** [Mitchell Katzel](#); [Christie A Robinson](#)  
**Cc:** [Sunshine Ventura Julian](#)  
**Subject:** FW: Upper Llagas CEQA Comment  
**Date:** Wednesday, February 19, 2014 6:27:03 AM

---

---

**From:** mikemonroe170@gmail.com [mailto:mikemonroe170@gmail.com] **On Behalf Of** Mike Monroe  
**Sent:** Tuesday, February 18, 2014 3:28 PM  
**To:** Michael Martin  
**Subject:** Upper Llagas CEQA Comment

Dear Mr. Martin:

Thank you for coordinating the comments and questions with regard to the Upper Llagas DEIR. My concern is the assimilation of the Lake Silveira property into the final planning document as a community park with a linear multi-purpose trail alongside a new West Little Llagas channel. My hope is that either the City of Morgan Hill or Santa Clara County Parks will extend the recreation pathway that now exists north of Watsonville Rd. to connect with a Lake Silveira/Llagas Creek riparian park.

Best regards-

Mike Monroe  
8752 Lions Creek Drive  
Gilroy, CA 95020  
(408)234-6377



## 2.1.6 Letter CDFW



State of California – The Natural Resources Agency  
DEPARTMENT OF FISH AND WILDLIFE  
Bay Delta Region  
7329 Silverado Trail  
Napa, CA 94558  
(707) 944-5500  
[www.wildlife.ca.gov](http://www.wildlife.ca.gov)

EDMUND G. BROWN JR., Governor  
CHARLTON H. BONHAM, Director



February 14, 2014

Mr. Michael Martin  
Santa Clara Valley Water District  
5750 Almaden Expressway  
San Jose, CA 95118

Dear Mr. Martin:

Subject: Upper Llagas Creek Flood Protection Project, Draft Environmental Impact Report,  
SCH #2012102032, Santa Clara County

The California Department of Fish and Wildlife (CDFW) has reviewed the Santa Clara Valley Water District's (SCVWD) Upper Llagas Creek Flood Protection Project Draft Environmental Impact Report (EIR), and has received an extension to February 24, 2014 by SCVWD (per Michael Martin, email dated February 12, 2014) to submit comments. We have the following comments:

**Appendix C, Page C-10 – Concrete Curing:** Best Management Practice (BMP) WQ-10 states that wet sacked concrete and poured concrete will be excluded from the wetted channel for a period of two weeks after installation. Due to the alkalinity of fresh concrete and its potential effects to increase the pH of a waterbody, CDFW recommends that the BMP be revised to state that wet sacked concrete and poured concrete will be excluded from the wetted channel for a minimum of 30 days after installation. A period of less-than 30 days may be acceptable upon use of a commercial sealant, once the sealant has dried (as already described in the BMP).

**Pages S-22 and 3.5-20 – Incidental Take Permit:** On page S-22, the draft EIR states that SCVWD will need to obtain an Incidental Take Permit (ITP) for the California tiger salamander (*Ambystoma californiense*) from the U.S. Fish and Wildlife Service (USFWS). Please be advised that CDFW may also issue an ITP to an applicant to authorize take of a state listed species pursuant to Fish and Game Code 2081(b). On page 3.5-20, the draft EIR states that although the likelihood of California tiger salamander utilizing the project area is very low, there is potential for this species to occur within the project area, due to 1) the presence of potentially suitable California tiger salamander breeding habitat within the project area (i.e., ponded water and suitable upland habitat adjacent to the Llagas Creek channel), 2) the presence of suitable California tiger salamander dispersal habitat within the project area, and 3) the proximity of the project to other potential California tiger salamander breeding habitat. Please be advised that if the project may result in take of a state listed species as defined by Fish and Game Code Section 86 (take is defined as hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch, capture, or kill), CDFW recommends that SCVWD apply for a 2081(b) ITP.

**Page 2-72 – Lake Silveira Flow Split:** The draft EIR states that when base flows upstream of Lake Silveira are low (less-than three cubic feet per second (cfs) in drought years), most of the flow would be directed to the newly created wetland habitat. When base flows exceed three cfs (which is most of the time), the flow would be directed mostly to the historic channel. Since

*Conserving California's Wildlife Since 1870*

Mr. Michael Martin  
February 14, 2014  
Page 2

Llagas Creek is in a relatively dry watershed, and Santa Clara County (like much of the Central Coast of California) is frequently subject to very dry-year or drought conditions, flows upstream of the flow split should be directed to the historic channel when base flows are low, not away from the historic channel, as described in the draft EIR. During dry-year or drought conditions, CDFW recommends that base flows remain in the historic channel to maximize benefits to rearing habitat for the South/Central California Coast steelhead (*Oncorhynchus mykiss*), which is federally threatened and a State Species of Special Concern, as well as other native fish and aquatic resources, and riparian habitat.

The National Marine Fisheries Service (NMFS) provided a comment letter to SCVWD (dated January 16, 2014) on the November 2013 Draft Lake Silveira Restoration Project Development Report. NMFS staff provided several comments and questions relating to issues pertaining to the conceptual design of the Lake Silveira Restoration Project, as well as suggesting alternative methods to achieving some of the goals of the restoration project. CDFW recommends that the SCVWD expand on the discussion in the draft EIR pertaining to the flow split to Lake Silveira, and include discussion of the comments and questions brought forth by NMFS in their comment letter.

**Page 2-89 – West Little Llagas Creek:** The draft EIR states that a 36-inch-diameter reinforced concrete pipe (RCP) will be constructed parallel to Hale Avenue, stretching from a weir structure 2,400 feet downstream and discharging into the existing West Little Llagas Creek channel south of West Main Avenue. The draft EIR also states that the 2,400-foot-long section of West Little Llagas Creek will be replaced with the RCP culvert. This section of the draft EIR is not clear as to whether the RCP is proposed to be placed in the channel, converting an earthen channel to RCP and thus resulting in a net-loss of 2,400 feet of earthen channel, or whether the RCP would be placed adjacent to the channel (beneath Hale Avenue). Please revise the project description to clarify where the RCP will be placed and whether 2,400 feet of earthen channel will be permanently lost by placement of the RCP. If there will be a loss of earthen channel, the draft EIR should be revised to include appropriate mitigation for the permanent loss of earthen channel.

**Pages 3.4-5, 3.4-17, and 3.4-36 – Special-Status Plants:** The draft EIR states that vegetation sampling was conducted in portions of the project area on September 20-23, 2011; vegetation mapping was conducted on October 18, 19, and 21, 2011; wetland delineations were conducted on October 17-18, 2011 and January 16-17, 2012; and vegetation mapping and sampling was conducted in West Little Llagas Creek on April 17-20, 2012. The draft EIR then describes existing conditions within each reach, but acknowledges that the floristic descriptions were limited because identification of herbaceous species is limited during the fall and winter. On page 3.4-17, the draft EIR states that focused protocol-level surveys for special-status plant species have not been conducted within the project area but that no special-status plant species were observed during the above-mentioned surveys. Please be advised that conducting non-protocol level botanical surveys during a seasonal period when the species would be difficult if not impossible to identify does not constitute a survey effort adequate to demonstrate absence of sensitive plant species which could potentially be impacted during implementation of the project.



Mr. Michael Martin  
February 14, 2014  
Page 3

The draft EIR identifies four plant species (Rare Plant Rank 1B) that will be the focus of protocol-level pre-construction surveys, according to BMP BI-12. CDFW recommends that the draft EIR be revised to include the California Native Plant Society listing of these four plant species. CDFW also recommends that the draft EIR be revised to state that protocol-level surveys will be conducted for any state listed plant species that could occur within the project area. The draft EIR states that BI-12 will require any impacts to special-status plants or sensitive communities to be minimized by flagging, creating buffer zones, and timing construction to coincide with less sensitive cycles of the plant species. Please be advised that minimizing impacts to sensitive plant species (including state listed plant species, if they were present) during the "sensitive" cycles of the plant species would not constitute take avoidance. Additionally the draft EIR should include adequate mitigation for any impacts to listed and sensitive plant species.

**Pages 3.4-26 and 3.4-32 – Temporary vs. Permanent Impacts:** The draft EIR states that grading impacts to upland herbaceous habitat, perennial marsh, and seasonal wetlands are considered temporary because these areas are expected to re-establish after grading. Please be advised that if the project site is not restored to pre-project (or better) conditions within one year of the impact, then CDFW does not consider the impacts to be temporary. These impacts may be considered semi-permanent or permanent, depending on the duration needed for re-establishment to pre-project conditions. Thus, the impacts to perennial emergent marsh described in Table 3.4-5 may need to be revised, if impacts categorized as temporary are actually semi-permanent or permanent.

**Page 3.4-32 – Table 3.4-4:** Table 3.4-4 shows the impacts to vegetation types and habitats within Fish and Game Code Section 1600 et seq. jurisdiction. Footnote 2 states that impacts associated with riprap, access ramps, and other design features are not included in this table, but would generally be minor. Please explain what is meant by "other design features". It is not clear why these features described in Footnote 2 are not included in the impacts. Riprap is a hardscape element which may preclude the growth and establishment of riparian vegetation. CDFW recommends that the impacts presented in this table be revised to fully describe all impacts to vegetation types and habitat within CDFW 1600 jurisdiction.

**Page 3.4-33 – Table 3.4-6:** Table 3.4-6 shows the impacts to vegetation types and habitats outside of CDFW 1600 jurisdiction for the preferred alternative. The categories in this table include riparian forest and riparian scrub shrub. While these categories are also included in Tables 3.4-4 and 3.4-5, which include impacts within CDFW 1600 jurisdiction, it is unclear why Table 3.4-6 includes these vegetation categories, but is considered to be outside of CDFW 1600 jurisdiction. The text on page 3.4-31 describes CDFW 1600 jurisdiction as extending from the outer limits of either 1) the top of bank, or 2) the limit of riparian tree canopies, whichever is greater. Please explain why the impacts described under the riparian forest and riparian scrub shrub in Table 3.4-6 are not considered to be within CDFW 1600 jurisdiction.

**Page 3.4-38 – Riparian Mitigation Ratios:** Mitigation Measure BOT-1c T states that a revegetation and monitoring plan will be prepared to compensate for impacts to wetlands, riparian woodland, riparian scrub-shrub, and California sycamore woodland, consistent with the Draft Fish and Wildlife Coordination Act Report (CAR) dated 2003. Per the CAR, mitigation ratios for impacts to riparian woodland and riparian scrub-shrub range from 1.5:1 to 1.7:1,

Mr. Michael Martin  
February 14, 2014  
Page 4

depending on the reach of the project. The draft EIR states that per the CAR, these ratios may be reduced by 40% for impacts to non-native riparian woodland and riparian scrub-shrub. The draft EIR does not address a specific mitigation ratio for wetland impacts. Please be advised that CDFW does not consider the above-referenced mitigation ratios adequate to compensate impacts to wetland or riparian habitat located within CDFW 1600 jurisdiction. At a minimum, CDFW recommends a 3:1 mitigation ratio for wetland impacts that will not be restored to pre-project conditions or better within one year. CDFW recommends a mitigation ratio of at least 3:1 for impacts to woody riparian vegetation. Mitigation for impacts to oaks, sycamores, and other slow-growing native species may require a mitigation ratio greater than 3:1 and mitigation amounts should also be based on size or age of tree being lost or damaged.

The draft EIR states, "SCVWD considered habitat value for native riparian scrub-shrub under riparian woodland canopy and proposed a 33% reduction in mitigation ratios for impacts to native riparian scrub-shrub under riparian woodland canopy that is not removed". This sentence is not clear. It is unclear why mitigation is proposed for vegetation that will not be removed; whether the text refers to riparian scrub-shrub that is not removed, or whether it refers to riparian woodland canopy that is not removed; and what the basis is for the reduction in mitigation ratio by 33%. Please revise this section.

**Page 3.4-38 – Monitoring Plan for West/East Little Llagas Creek:** Mitigation Measure BOT-1d T states that SCVWD will prepare a plan to monitor changes to vegetation and vegetative communities in West/East Little Llagas Creek that may result from altered hydrology related to the project. The mitigation measure states that monitoring will be conducted for a minimum of five years, and that, [at the end of the five year period], replacement for any loss of native mature trees will be at a minimum 5:1 ratio. Since impacts to West/East Little Llagas Creek are currently unknown, CDFW recommends monitoring these channels beginning at year three or earlier to determine if there is a loss of riparian habitat resulting from changes in channel hydrology. In the event that losses are documented, this would enable SCVWD to begin implementing a replanting effort early on to minimize temporal impacts to the riparian community.

**Page 3.4-39 – Impacts to Wetlands:** The draft EIR states that most impacts (32.88 acres) to U.S. Army Corps of Engineers habitats are temporary due to channel excavation. Please be advised that if the project site is not restored to pre-project conditions (or better) within one year, CDFW does not consider the impacts to be temporary. CDFW has adopted the USFWS' one-parameter definition of wetlands, and has a no-net-loss policy on wetlands (Fish and Game Code 2013, Wetland Resources, page 610). CDFW recommends that the draft EIR be revised to characterize impacts to wetlands according to the definitions of temporary and permanent provided above. In addition the draft EIR should provide a minimum mitigation ratio at which SCVWD proposes to mitigate temporary and permanent impacts to wetlands.

**Page 3.5-12 – Special-Status Wildlife Species:** The draft EIR states that special-status wildlife species are species listed or proposed for listing under the federal Endangered Species Act (ESA); species that are Candidates for listing under ESA; species listed or proposed for listing under the California Endangered Species Act (CESA); species that meet the definitions of rare or endangered under the California Environmental Quality Act Guidelines Section 15380; Fully Protected animals in California; and animal Species of Special Concern to CDFW. Please



Mr. Michael Martin  
February 14, 2014  
Page 5

be advised that species that are Candidates for listing under CESA also meet the definition of special-status wildlife species. State Candidate species are also subject to the same protection as State endangered and threatened species. Please revise the draft EIR accordingly.

The draft EIR states that species evaluated as being unlikely to occur within the project area are considered to be beyond their known range or to have low habitat suitability for reproduction, cover, and/or foraging, and that these species are not discussed further. Please be advised that if suitable habitat is present (regardless of whether it is considered to be high or low quality), there is a lack of dispersal barriers, and the species is within dispersal range of suitable breeding areas, CDFW will assume presence of the species if protocol-level surveys have not been conducted to confirm absence.

**Page 3.5-12 – California Natural Diversity Database:** The draft EIR states that the list of special-status wildlife species was compiled based on a review of records from the California Natural Diversity Database (CNDDDB - 2012), USFWS online species list (2012), and literature resources. Please be advised that the most updated CNDDDB and USFWS lists should be reviewed prior to submitting permit applications (i.e., 1600 Lake and Streambed Alteration Agreement Notifications and 2081(b) ITP) to CDFW.

**Pages 3.5-13 and 3.5-54-3.5-56 – Townsend's Big-Eared Bat:** Table 3.5-1 shows the special-status wildlife species potentially occurring in the project area. On pages 3.5-54-3.5-56, the draft EIR addresses other species of bat that may be affected by the project. There is no mention of the State Candidate Townsend's big-eared bat (*Corynorhinus townsendii*) in the document. Please indicate whether project impacts have been considered for this species. Please be advised that if take cannot be avoided for a State Candidate species, SCVWD should apply to CDFW for a 2081(b) ITP.

**Pages 3.5-26 and 3.5-52- 3.5-53 – Santa Clara Valley Habitat Plan:** The draft EIR states that SCVWD is proposing to provide mitigation through the Santa Clara Valley Habitat Plan (Plan) as a compensatory measure for impacts to upland habitat for the protection of California tiger salamander. Please be advised that since the Upper Llagas Creek Flood Protection Project is not a covered activity identified under the Plan, as described in the comment on page 1 describing the ITP, if the project will result in take of a state-listed species, SCVWD will need to apply to CDFW for an ITP. It appears from the discussion on pages 3.5-52 and 3.5-53 that take may occur, as the draft EIR describes the possibility of translocating special-status amphibians to suitable habitat that will not be affected by construction activity. Please be advised that CESA requires impacts to state-listed species to be fully mitigated and involves a Habitat Management Land process, which includes acquisition, enhancement, and permanent protection of Habitat Mitigation lands through placement of a conservation easement, endowment, and long-term management plan.

The draft EIR states on page 3.5-20 that there is suitable California tiger salamander breeding habitat adjacent to the channel. CDFW recommends that the draft EIR be revised to describe any potential direct or indirect impacts to salamander breeding and/or upland habitat that may occur from implementation of the project, and include appropriate mitigation for any such impacts.

Mr. Michael Martin  
February 14, 2014  
Page 6

**Page 3.5-61 – San Francisco Dusky-Footed Woodrat:** The draft EIR states that if any State Species of Special Concern San Francisco dusky-footed woodrat (*Neotoma fuscipes annectens*) nests cannot be avoided, trapping and relocation of woodrats may be conducted in consultation with CDFW. Please be advised that CDFW is unlikely to approve trapping and relocation of woodrats. CDFW is willing to work with SCVWD to develop a nesting material relocation, enhancement, and monitoring plan to minimize impacts to this species.

**Page 3.6-29 – Steelhead Passage:** Mitigation Measure AQUA-1a T states that passage for adult salmonids through different types of instream structures will be obtained by following type-specific criteria and guidelines, and analyzing site-specific attributes to maintain water velocities of less-than three to four meters per second, fall heights of less-than three meters, and depth of pools below the falls at least 1.25 times the fall height. Fall heights of three meters would equate to a jump height of just below ten feet. Please clarify if the reference to three meters for fall heights is a typo and whether this should be revised to say fall heights of less-than three feet.

CDFW appreciates the opportunity to comment on SCVWD's draft EIR. If you have any questions regarding this letter and further coordination on this project, please contact Ms. Tami Schane, Environmental Scientist, at (415) 831-4640; or Ms. Brenda Blinn, Senior Environmental Scientist (Supervisory), at (707) 944-5541.

Sincerely,



Scott Wilson  
Regional Manager  
Bay Delta Region

cc: State Clearinghouse  
Jon Ambrose, National Marine Fisheries Service – [jonathan.ambrose@noaa.gov](mailto:jonathan.ambrose@noaa.gov)  
Jon Rohrbough, State Water Resources Control Board – [jon.rohrbough@waterboards.ca.gov](mailto:jon.rohrbough@waterboards.ca.gov)  
Joseph Terry, U.S. Fish and Wildlife Service – [joseph\\_terry@fws.gov](mailto:joseph_terry@fws.gov)



**2.1.7 Letter VTA**



February 19, 2014

Santa Clara Valley Water District  
5750 Almaden Expressway  
San Jose, CA 95118

Attention: Michael Martin

Subject: Upper Llagas Creek Flood Protection

Dear Mr. Martin:

Santa Clara Valley Transportation Authority (VTA) staff have reviewed the Draft EIR (DEIR) for flood control measures for a 13 mile stretch of Llagas Creek from Gilroy to Morgan Hill. We have the following comments.

Pedestrian and Bicycle Access

The DEIR notes that portions of the West Llagas Creek Trail, which provides opportunities for walking, biking, and other trail related activities from Downtown to Watsonville Road, would be replaced by a maintenance road for the flood protection project. In addition, an existing pedestrian bridge near Watsonville Road would be removed.

In sections where the trail is closed to pedestrians and bicyclists permanently or temporarily, the closing should be posted 30 days in advance and the detour routes should be designed in conformance with the VTA Bicycle Technical Guidelines (BTG). In addition, if the alternate route is a significant increased distance or travel time compared to the trail, consideration should be given to allowing pedestrians and dismounted bicyclists to continue to share the pathway, as discussed in the BTG. VTA's Bicycle Technical Guidelines may be downloaded from <http://www.vta.org/projects-and-programs/planning/bikes-bicycle-technical-guidelines-btg>.

Thank you for the opportunity to review this project. If you have any questions, please call me at (408) 321-5784.

Sincerely,

A handwritten signature in black ink, appearing to read "RM", is written over a light blue circular stamp.

Roy Molseed  
Senior Environmental Planner

SCVWD1401

## 2.1.8 Letter CALTRANS

STATE OF CALIFORNIA—CALIFORNIA STATE TRANSPORTATION AGENCY

EDMUND G. BROWN Jr., Governor

### DEPARTMENT OF TRANSPORTATION

111 GRAND AVENUE  
OAKLAND, CA 94612  
PHONE (510) 286-6053  
FAX (510) 286-5559  
TTY 771



*Flex your power!  
Be energy efficient!*

February 19, 2014

SCL101894B  
SCL/101/VAR  
SCH# 2012102032

Mr. Michael Martin  
Santa Clara Valley Water District  
5750 Almaden Expressway  
San Jose, CA 95118

Dear Mr. Martin:

### **The Upper Llagas Creek Flood Protection Project – Draft Environmental Impact Report (DEIR)**

Thank you for continuing to include the California Department of Transportation (Caltrans) in the environmental review process for the project referenced above. We have reviewed the DEIR and have the following comments to offer.

#### ***Construction Traffic Impact Study (TIS)***

One of Caltrans' ongoing responsibilities is to collaborate with local agencies to avoid, eliminate, or reduce to insignificance potential adverse impacts by local development on State highways. We recommend using the Caltrans *Guide for the Preparation of Traffic Impact Studies* (TIS Guide) for determining which scenarios and methodologies to use in the analysis. The TIS Guide is a starting point for collaboration between the lead agency and Caltrans in determining when a TIS is needed. The appropriate level of study is determined by the particulars of a project, the prevailing highway conditions, and the forecasted construction traffic. The TIS Guide is available at the following website address: [http://dot.ca.gov/hq/tpp/offices/ocp/igr\\_ceqa\\_files/tisguide.pdf](http://dot.ca.gov/hq/tpp/offices/ocp/igr_ceqa_files/tisguide.pdf).

The TIS should include:

1. Vicinity map, regional location map, and a site plan clearly showing project access in relation to nearby State roadways. Ingress and egress for all project components should be clearly identified. The State right-of-way (ROW) should be clearly identified. The maps should also include project driveways and local roads and intersections.
2. Project-related trip generation, distribution, and assignment. The assumptions and methodologies used to develop this information should be detailed in the study, and should be supported with appropriate documentation.
3. Average Daily Traffic, AM and PM peak hour volumes and levels of service (LOS) on all

*"Caltrans improves mobility across California"*



Mr. Michael Martin/Santa Clara Valley Water District  
February 19, 2014  
Page 2

roadways where potentially significant impacts may occur, including crossroads and controlled intersections. The analysis should clearly identify the project's contribution to area traffic and any degradation to existing and cumulative LOS. Caltrans' LOS threshold, which is the transition between LOS C and D, and is explained in detail in the TIS Guide, should be applied to all State facilities.

4. Schematic illustration of traffic conditions including the project site and study area roadways, trip distribution percentages and volumes as well as intersection geometrics (i.e., lane configurations) for the scenarios described above.

#### ***Lead Agency***

As the lead agency, Santa Clara Valley Water District (SCVWD) is responsible for all project mitigation, including any needed improvements to State highways. The project's financing, scheduling, implementation responsibilities and lead agency monitoring should be fully discussed for all proposed mitigation measures. This information should also be presented in the Mitigation Monitoring and Reporting Plan of the environmental document.

#### ***Transportation Management Plan***

If it is determined that traffic restrictions and detours are needed on or affecting State highways, a Transportation Management Plan (TMP) or construction TIS may be required of the developer for approval by Caltrans prior to construction. TMPs must be prepared in accordance with California *Manual on Uniform Traffic Control Devices*. Further information is available for download at the following web address:

<http://www.dot.ca.gov/hq/traffops/signtech/mutcdsupp/pdf/camutcd2012/Part6.pdf>.

Please ensure that such plans are also prepared in accordance with the transportation management plan requirements of the corresponding jurisdictions. For further TMP assistance, please contact the Office of Traffic Management Plans at (510) 286-4647.

#### ***Transportation Permit***

Project work that requires movement of oversized or excessive load vehicles on State roadways requires a transportation permit that is issued by Caltrans. To apply, a completed transportation permit application with the determined specific route(s) for the shipper to follow from origin to destination must be submitted to: Caltrans Transportation Permits Office, 1823 14th Street, Sacramento, CA 95811-7119. See the following website for more information:  
<http://www.dot.ca.gov/hq/traffops/permits>.

#### ***Encroachment Permit***

Please be advised that any work or traffic control that encroaches onto the State ROW requires an encroachment permit that is issued by Caltrans. To apply, a completed encroachment permit application, environmental documentation, and five (5) sets of plans clearly indicating State ROW must be submitted to the address below. David Salladay, District Office Chief, Office of Permits, California Department of Transportation, District 4, P.O. Box 23660, Oakland, CA 94623-0660. Traffic-related mitigation measures should be incorporated into the construction plans prior to the

*"Caltrans improves mobility across California"*

Mr. Michael Martin/Santa Clara Valley Water District  
February 19, 2014  
Page 3

encroachment permit process. See this website for more information:  
<http://www.dot.ca.gov/hq/traffops/developserv/permits>.

Should you have any questions regarding this letter, please call Brian Brandert of my staff at (501) 286-5505 or [brian.brandert@dot.ca.gov](mailto:brian.brandert@dot.ca.gov).

Sincerely,

A handwritten signature in blue ink, appearing to read "Erik Alm", with a stylized flourish at the end.

ERIK ALM, AICP  
District Branch Chief  
Local Development - Intergovernmental Review

c: Scott Morgan, State Clearinghouse

*"Caltrans improves mobility across California"*



## 2.1.9 Letter NMFS



**UNITED STATES DEPARTMENT OF COMMERCE**  
**National Oceanic and Atmospheric Administration**  
NATIONAL MARINE FISHERIES SERVICE

West Coast Region  
777 Sonoma Avenue, Room 325  
Santa Rosa, California 95404-4731

February 26, 2014

In response reply to:  
151422SWR2002SR6450

Michael Martin  
Santa Clara Valley Water District  
5760 Almaden Expressway  
San Jose, California 95118

Dear Mr. Martin:

NOAA's National Marine Fisheries Service (NMFS) is providing comments on the Santa Clara Valley Water District's (SCVWD) Upper Llagas Creek Flood Protection Draft Environmental Impact Report (EIR), dated January 6, 2014. The purpose of the Llagas Creek Flood Control Project (Project) is to provide flood protection for the City of Morgan Hill and community of San Martin along East Little Llagas Creek, West Little Llagas Creek, and portions of mainstem Llagas Creek. The objectives of the Project include: increasing flood protection for up to a 1-percent flood exceedance event (100-year flood) in the City of Morgan Hill; providing a 10-percent flood exceedance capacity (10-year flood) on East Little Llagas Creek; and assuring no additional flooding is induced on Llagas Creek from the aforementioned modifications. Llagas Creek is a tributary in the upper Pajaro River Watershed and maintains populations of federally threatened South-Central California Coast (S-CCC) Distinct Population Segment (DPS) steelhead (*Oncorhynchus mykiss*) and designated critical habitat. NMFS is providing comments on portions of Section 3.6 of the EIR.

**Page 3.6 – 7:** On January 16, 2014, NMFS provided comments on the Lake Silveira Restoration Project Development Report to the SCVWD. We recommend the SCVWD review and adopt comments from our letter and focus the majority of instream flows down the historical channel, rather than bifurcating stream flow through both the historical channel and Lake Silveira.

**Page 3.6 – 12.** The EIR states "Casagrande (2011) also observed five YOY near the Llagas Avenue Bridge (Reach 6) in 2010. The Llagas Avenue Bridge site has the best observed habitat conditions (substrate quality, abundance of riffles, runs, and heads of pools), and scale samples indicated substantial growth for YOY." This statement is incorrect. According to Casagrande (2011) in 2010, the five *O. mykiss* found were at the Llagas Road site (the first bridge below Chesbro Reservoir.). The Llagas Road site has the best habitat. The Llagas Avenue site (different location but in the project area) was sampled only in 2011 (Casagrande 2012), and it did not have *O. mykiss* present. Habitat conditions in Llagas Creek at this site are poor for steelhead rearing.



**Page 3.6 – 12.** The Magnuson-Stevens Fishery Conservation and Management Act (MSA) does not apply to the project area. Steelhead is not a commercially harvested species and therefore, Llagas Creek does not contain Essential Fish Habitat as defined under the MSA.

**Page 3.6 – 29.** NMFS engineering staff conducted a preliminary review of some of the designs referenced in *Mitigation Measure AQUA – 1a* and has concerns regarding the sufficiency of information provided by the SCVWA to support review of the proposed designs. We recommend the SCVWA meet with NMFS to discuss issues and concerns over the criteria and rationale behind proposed instream structures in Llagas Creek. Specific questions arose regarding velocities within the project area, spacing and composition of large wood structures, and goals for the habitat features in context to steelhead migration. It is likely that some of the information necessary to evaluate the efficacy of the proposed mitigation measures has already been collected as part of the project and could be readily provided for our review.

Installation of instream habitat features will require ongoing monitoring and maintenance to ensure they function as designed. For example, large wood structures will likely degrade overtime, and a maintenance and replacement plan should be considered a long term obligations of this project. Wood structures should be made of durable natural materials such as large diameter redwood (with rootwads) to minimize frequency of replacement.

We disagree that “implementation of *Mitigation Measure AQUA – 1a* would reduce impacts ... to less than significant.” Configuring Llagas Creek into a flood control channel is a significant impact, regardless of the mitigation measures associated with its construction. Llagas Creek is significantly adversely impacted by past and ongoing land and water use practices including construction of Chesbro Reservoir, build-out of the City of Morgan Hill, and channelization as part of Highway 101 construction. This project will continue the trend of degradation, albeit with some important minimization and mitigation measures. NMFS has worked with the US Army Corps of Engineers and the SCVWD for many years on this project (since 2001) and supports many of the mitigations measures associated with this project. We believe implementation of many of the proposed mitigation measures may be helpful during steelhead migration; however, it is incorrect to presume these measures will offset construction of this large flood control project to a less than significant level.

**Page 3.6 – 29.** *Mitigation Measure AQUA-1b* addresses the removal and loss of large woody material within the project footprint. Large woody debris can play a very important role for migrating salmonids in Llagas Creek including, but not limited to, it’s role as velocity refuge. We are concerned measures to minimize impacts to large wood in the channel will be difficult to implement and the language is sufficiently vague so that removal and modification could be justified under almost any circumstance. For example, the EIR states large wood debris would “...be inspected to determine if it poses and erosion hazard of (*sic*) flood threat, and a biologist will assess if it is ecologically important to the channel.” Large diameter wood in a flowing channel has a hydraulic effect to water velocity, flow direction, and typically may cause localized erosion (and thereby creates pools, *et cetera*) by its very nature. Therefore, it is possible that virtually

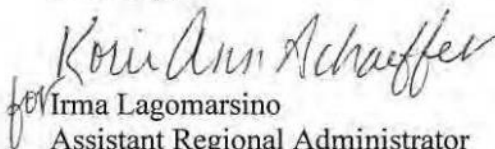


all instream wood could be modified or removed, even if only contributing to minimal erosion in the stream channel. We recommend the SCVWD review and adopt a program similar to the large wood maintenance program currently implemented by the County of Santa Cruz Department of Public Works (County). The County has adopted measures to minimize (but not avoid or completely mitigate) impacts to these critical habitat elements in waterways throughout the County while concurrently addressing concerns over flood risk and localized erosion.

Thank you for the opportunity to comment on the EIR. Comments in this letter highlight some of our more significant concerns over assumptions and conclusions presented in the EIR and should not be viewed as comprehensive of all aspects of this project or the Llagas Creek Flood Control Project. As the project design progresses, additional concerns not addressed in this letter may arise.

If you have questions or concerns regarding this letter please contact either Jonathan Ambrose at (707) 575-6091 or Joel Casagrande at (707) 575-6016.

Sincerely,

  
for Irma Lagomarsino  
Assistant Regional Administrator  
California Coastal Area Office

cc: Tami Shane, CDFW, Yountville, CA  
Michelle Leicester, CDFW, Yountville, CA  
Jon Rohrbough, RWQCB, San Luis Obispo, CA  
Amber Aguilera, USFWS, Sacramento, CA  
Joseph Terry, USFWS, Sacramento, CA

#### Literature Cited

- Casagrande, J. 2011. Uvas Creek steelhead distribution, density, growth and habitat use, 2010. Prepared for the California Department of Fish and Wildlife and National Marine Fisheries Service. 30 p.
- Casagrande, J. 2012. Uvas and Llagas Creek juvenile steelhead distribution and abundance, 2011. Prepared for the California Department of Fish and Wildlife and National Marine Fisheries Service. 49 p.

## 2.1.10 Letter CCRWQCB



### Central Coast Regional Water Quality Control Board

February 25, 2014

Michael Martin  
Santa Clara Valley Water District  
5750 Almaden Expressway  
San Jose, CA 95118-3614  
email: [mmartin@valleywater.org](mailto:mmartin@valleywater.org)

VIA ELECTRONIC MAIL

#### CENTRAL COAST WATER BOARD COMMENTS ON THE JANUARY 2014 DRAFT ENVIRONMENTAL IMPACT REPORT FOR THE UPPER LLAGAS CREEK FLOOD PROTECTION PROJECT, SANTA CLARA COUNTY, FILE NO. 430114CQ01

Dear Mr. Martin:

Thank you for the opportunity to review the above-referenced document. The Central Coast Regional Water Quality Control Board (Central Coast Water Board) is a responsible agency under the California Environmental Quality Act (CEQA). Central Coast Water Board staff understands that the proposed Upper Llagas Creek Flood Protection Project (Project) involves the following:

- Modifying Reaches 4, 5, and 6 of Llagas Creek, Reaches 7B and 8 of West Little Llagas Creek, and Reach 14 of East Little Llagas Creek, to improve their geomorphic stability and provide improved flood protection for northern Morgan Hill;
- Constructing the Reach 7A diversion channel;
- Diverting flow from the West Little Llagas-East Little Llagas Creek (WLLC-ELLC) channel between Reach 7B and Reach 14;
- Restoring flow to the historic Llagas Creek channel around Lake Silveira; and
- Constructing maintenance roads.

The Project has the potential to impact water quality and beneficial uses of waters of the State. Therefore, Central Coast Water Board staff offers the following recommendations for improving the environmental value of the Project and facilitating issuance of the Project's Clean Water Act Section 401 Water Quality Certification.

#### Previous Comments

Central Coast Water Board staff has previously provided comments on the Project to the Santa Clara Valley Water District (District). Many of these comments relate to Central Coast Water Board staff's environmental review of the Project. The District has responded to many of our previous comments and has modified the Project in response to some of our comments. The following comment letters and memoranda previously sent to the District are incorporated into this letter by reference:

DR. JEAN-PIERRE WOLFF, CHAIR | KENNETH A. HARRIS JR., EXECUTIVE OFFICER

895 Aerovista Place, Suite 101, San Luis Obispo, CA 93401 | [www.waterboards.ca.gov/centralcoast](http://www.waterboards.ca.gov/centralcoast)





Santa Clara Valley Water District

- 2 -

February 25, 2014

- 30% Design Review, Comment Letter, dated August 23, 2012, signed by Watershed Planning and Protection Section Manager, Lisa H. McCann, for Kenneth A. Harris, Jr., Interim Executive Officer. (Provided comments on the 30% Project design.)
- Topics for Discussion, Staff Memorandum, via email, dated September 19, 2012, from staff Water Resource Control Engineer, P.E., Jon Rohrbough. (Identified issues that required resolution prior to Central Coast Water Board approval of the Project.)
- Notice of Preparation Review, Comment Letter, dated November 26, 2012, signed by Phillip Hammer, Water Quality Certification Program Manager, for Kenneth A. Harris, Jr., Interim Executive Officer. (Provided comments on the Notice of Preparation of a Draft Environmental Impact Report for the Project.)
- 65% Design Review, Staff Comment Email, dated May 16, 2013, from Water Resource Control Engineer, P.E., Jon Rohrbough. (Provided comments on the 65% Project design.)
- Reiteration of Design Considerations, Staff Memorandum, via email, dated July 12, 2013, from Water Resource Control Engineer, P. E., Jon Rohrbough. (Reiterated issues that still required resolution prior to Central Coast Water Board approval.)
- Comments on Technical Support Documents, Staff Memorandum, via email, dated August 1, 2013, from Water Resource Control Engineer, P.E., Jon Rohrbough. (Provided comments on six technical support memoranda associated with the 65% Project design.)
- Criteria for Demonstrating Minimization and Mitigation of Impacts to Waters of the State, Upper Llagas Creek Flood Protection Project, Letter, dated October 25, 2013, signed by Kenneth A. Harris, Jr., Executive Officer. (Provided criteria Central Coast Water Board staff will use to evaluate the Project's minimization and mitigation of impacts to waters of the State.)

### Ongoing Discussions

In addition to providing previous comments, Central Coast Water Board staff and District staff are involved in ongoing cooperative discussions and negotiation regarding multiple elements of the Project. These discussions are in varying stages of resolution. This letter does not supersede any of these ongoing discussions.

### Comments on the January 2014 Draft Environmental Report (DEIR)

1. Project purpose. On p. 1-7 of the DEIR, part of the Project purpose is misstated. It should read that the purpose of the proposed Project is to provide 10-year flood exceedance capacity on Reach 14, not on East Little Llagas Creek.
2. Construction schedule. The DEIR states on p. 2-52 that in-channel construction work will occur during the dry season (May 1 through October 15). It is unclear how the District is defining the term "in-channel." In the *2014-2023 Stream Maintenance Program Manual*, dated February 7, 2014, the District's definition of "in-channel" excludes some areas that are waters of the State. Central Coast Water Board staff plans to require that construction activities within top of bank (as defined by the figure on p. Glossary-15 of the *2014-2023 Stream Maintenance Program Manual*) be limited to the period between June 1 and September 30, unless the District obtains prior approval for work outside that time period.
3. Winterization. The Project will take several years to complete. The DEIR does not appear to include a description of how disturbed creek channels will be winterized each year to

Santa Clara Valley Water District

- 3 -

February 25, 2014

protect them against erosion and other water quality problems. To demonstrate that this impact will be mitigated to less than significant levels, the final EIR should include such a description.

4. Post-project maintenance. Operations and maintenance procedures described in Section 2.4.5 of the DEIR should be consistent with the *2014-2023 Stream Maintenance Program Manual*, dated February 7, 2014, and *San Francisco Bay Regional Water Quality Control Board's Draft Waste Discharge Requirements and Water Quality Certification for Santa Clara Valley Water District Stream Maintenance Program (Tentative Order)*, dated February 10, 2014.
5. Design flows. Table 3.2-1 of the DEIR is confusing. The table indicates that the design flow for Reaches 4, 5, and 6 is equal to the 10-year return period flow. However, the Project description indicates that these Reaches will be designed only to avoid increased flooding induced by upstream modifications.
6. Water quality
  - a. The DEIR states includes the following statement on p. 3.2-6: "From the 2010 integrated report (SWRCB 2010), there are two specific areas within Llagas Creek where water quality has been identified as impaired: Reach 14 and downstream of Reach 4." This statement is only partially correct. The 2010 integrated report identifies impairments within the following reaches of Llagas Creek: above Chesbro reservoir, below Chesbro reservoir, below Church Creek, and below Miller Slough. The reaches above Chesbro reservoir and below Miller Slough are outside the Project area, and the reach below Church Creek includes Reach 4 of Llagas Creek to the Pajaro River. Impairments listed for Llagas Creek below Chesbro Reservoir (chlorpyrifos, electrical conductivity, E. coli, low dissolved oxygen, and turbidity) are within the Project footprint and should be discussed in the final EIR.
  - b. Reach 7A will be constructed within agricultural fields and provide convenient drainage for stormwater and irrigation runoff from these fields. As a result, construction of Reach 7A has the potential to increase the discharge of agricultural pollutants to Llagas Creek. Llagas Creek is already listed as impaired for sediment, chlorpyrifos (pesticide), and nitrates. However, the DEIR does not address the potential post-project water quality impacts of constructing Reach 7A or identify mitigation measures to prevent the discharge of agricultural pollutants into Reach 7A to less than significant levels. Central Coast Water Board staff assumes that the District will retain ownership of Reach 7A, and will therefore have authority to control pollutant discharges.
7. Closed landfill adjacent to Reach 6. The DEIR states on p. 3.2-26 that channel modification activities in Reach 6 will encroach upon a closed landfill. This encroachment constitutes a potential water quality impact that should be identified as such in the final EIR, and the final EIR should identify mitigation measures to reduce the impact to less than significant levels. The DEIR also states that any planning of any ground disturbance work within the identified parcel requires consultation with Central Coast Water Board staff. Project planning and design have progressed beyond the 65% design stage. If the consultation with Central Coast Water Board staff has already occurred, the final EIR should describe how it took place and the results of the consultation, and all requirements imposed by Central Coast Water Board staff on ground disturbance activities within the identified parcel should be included in the final EIR as mitigation measures. If the consultation has not yet occurred, it



Santa Clara Valley Water District

- 4 -

February 25, 2014

should take place prior to completion of the final EIR so that all requirements imposed by Central Coast Water Board staff can be included as mitigation measures. In addition, the table of construction BMPs that begins on p. 2-62 should include a BMP to implement these requirements.

8. Waters of the State. Table 3.4-2 of the DEIR lists waters of the U.S. within the study area. However, it is not clear whether there are waters of the State within the study area that do not meet the definition for waters of the U.S. In addition, Tables 3.4-4, 3.4-5, and 3.4-6 identify impacts within USACE and CDFW jurisdictional areas, but do not specifically identify impacts to waters of the State. The final EIR must clearly identify all waters of the State and all impacts to those waters to ensure that all Project impacts are adequately addressed and mitigated to less than significant levels.
9. Impacts to the West Little Llagas – East Little Llagas Creek channel. The DEIR does not adequately assess or address impacts to the WLLC-ELLC channel resulting from the Project's diversion of flows from West Little Llagas Creek (WLLC) to Llagas Creek through Reach 7A. The final EIR should include a more detailed discussion and quantification of Project impacts to WLLC-ELLC.
  - a. The DEIR states that the section of WLLC between Reach 7A and the Butterfield Detention Basin will have reduced flows during events less than the 5-year event, and that low flows will also be reduced downstream of the Butterfield Detention Basin (p. 3.2-17). However, the DEIR does not identify the impacts that will result from this flow regime alteration. Potential impacts that should be assessed include, but are not limited to, the potential increase in concentrations of urban and agricultural pollutants in WLLC-ELLC (and Reach 14) resulting from the fact that nearly all of the flow in WLLC-ELLC will consist of local runoff.
  - b. The DEIR acknowledges that the diversion of WLLC would result in a permanent indirect impact to waters of the United States and waters of the State, and could result in conversion of wetland portions of the channel to upland habitat or reductions in the jurisdictional width of the channel's flow (p. 3.4-35). The DEIR also states that altering flow regimes in WLLC-ELLC could result in reduced growth rates and/or morphological changes or mortality in mature trees, all of which would be considered significant impacts (p. 3.4-35). However, the DEIR does not provide a detailed assessment or quantification of these impacts. In fact, the DEIR proposes to identify these impacts after the fact by monitoring the Project's effects on vegetation and wetland habitat in WLLC-ELLC. These impacts should be quantified, together with mitigation measures that will reduce the impacts to less than significant levels. At a minimum, the final EIR must identify and describe the mitigation that will be implemented for the various potential impacts that can be anticipated.
  - c. The DEIR proposes to conduct the post-Project monitoring program in WLLC-ELLC for five years. It is unclear that this period will be long enough to identify Project impacts to wetland habitat and riparian vegetation in WLLC-ELLC, and the DEIR does not provide any scientific basis for the adequacy of a 5-year monitoring program.
10. Mitigation
  - a. The Project's impacts are extensive, including impacts to 24.9 acres of native and non-native riparian forest, 13.03 acres of native and non-native riparian scrub, 4.77 acres of

Santa Clara Valley Water District

- 5 -

February 25, 2014

perennial marsh, 28.52 acres of streambed/channels, and 124.73 acres of upland herbaceous (some of which may be waters of the State, depending on the DEIR's definition of "upland"). In addition, these numbers do not include impacts to WLLC-ELLC, because the DEIR does not quantify those impacts. The DEIR states that mitigation measures will reduce these impacts to less than significant levels. However, this statement is premature for the following reasons:

- The impacts to WLLC-ELLC are still unknown. Therefore it is premature to assert that the impacts will be less than significant, or that mitigation measures included in the DEIR are adequate to mitigate them to less than significant levels.
  - The DEIR includes Mitigation Measure BOT-1c T to prepare a revegetation, monitoring, and mitigation plan. However, this mitigation measure does not include enough detail for Central Coast Water Board staff to determine that the revegetation, monitoring, and mitigation plan will mitigate Project impacts to a less than significant level. For example, Central Coast Water Board staff has stated in previous comments that the revegetation plan should be limited by hydraulic concerns as little as possible. However, the site photograph in Figure 3.13-1f indicates that conditions at the photographed location can support woody species in the channel, but woody that are not depicted in the visual simulation of the proposed project. The same discrepancy is evident in Figure 3.13-1g. As a result of this discrepancy, it is unclear that the revegetation plan will optimize vegetation on the basis of site conditions. The final EIR should clearly state and consistently represent all objectives of the mitigation plan, particularly those that have been discussed with regulatory agencies.
  - Revegetation will be limited by onsite soil and moisture conditions, which will not be fully known until the channel modifications have been completed.
  - According to the description of Mitigation Measure BOT-1e T, the District proposes to provide mitigation for the loss of mature trees in WLLC-ELLC. The DEIR is silent on mitigation for other losses in WLLC-ELLC.
  - The DEIR states that the District will replace lost mature trees in WLLC-ELLC at a 5:1 ratio. It is unclear that this will be possible. Since the District will revegetate Project channels in a manner that optimizes/maximizes onsite soil and moisture conditions, and the failure of trees in WLLC-ELLC suggests that WLLC-ELLC would not support additional trees, adequate locations for replacement trees may not be available. The final EIR must demonstrate that all proposed mitigation is achievable.
  - The DEIR states that the mitigation plan will compensate for impacts to California sycamore woodland (Mitigation Measure BOT-1c T). However, the DEIR also states that impacts to California sycamore woodland would remain significant after implementation of mitigation (p. 3.4-37). These statements are contradictory, and make it unclear that impacts to California sycamore woodland will be adequately mitigated.
  - The District has stated in previous discussions and responses to Central Coast Water Board comments that the revegetation plan will optimize vegetation for site soil and moisture conditions. However, this commitment is not included in the description of Mitigation Measure BOT-1c T: Prepare a Revegetation, Monitoring, and Mitigation Plan. Since this is an essential element of the revegetation approach, it should be clearly stated in the final EIR.
- b. The DEIR states that the revegetation, monitoring, and mitigation plan developed in accordance with Mitigation Measure BOT-1c T will be consistent with the *Draft Fish and Wildlife Coordination Act Report (CAR)* prepared by the United States Fish and Wildlife Service in 2003. However, Central Coast Water Board staff has provided previous



Santa Clara Valley Water District

- 6 -

February 25, 2014

comments that the mitigation strategy outlined in the CAR may not be adequate to satisfy Central Coast Water Board requirements. Specifically:

- It is unclear that the impact analysis in the CAR covers all waters of the State or fully identifies and evaluates all impacts to water quality and beneficial uses to waters of the State.
- The mitigation ratios recommended in the CAR may not be adequate to fully replace lost habitat functions and beneficial uses.
- The *Upper Llagas Creek 65% Design Habitat Impact Analysis Technical Memorandum* (June 17, 2013; prepared by H.T. Harvey and Associates) includes a statement that the "riparian scrub-shrub" designation includes species that are in early developmental stages of habitat designated as "riparian forest" (p. 2). Central Coast Water Board staff infers from this statement that this "early developmental stage" of riparian forest might be mitigated with riparian scrub-shrub. This approach could result in loss of habitat functions and beneficial uses, and therefore would not provide adequate mitigation.
- The *Upper Llagas Creek Project Revegetation Acreage and Planting Polygon Technical Memorandum* (revised June 6, 2013; prepared by H.T. Harvey and Associates) states that the District will claim 25% more area for mitigation than is planted, since the mature canopy will extend beyond the planting area. This approach is not mentioned in the DEIR, so it is unclear whether it will be incorporated into the Project revegetation, monitoring, and mitigation plan. In addition, combined with the low mitigation ratios already proposed, this approach would result in composite mitigation ratios for permanent impacts to riparian habitat that are little more than 1:1. This composite mitigation ratio may not be adequate to fully mitigate for impacts to riparian habitat. Finally, it is not clear in the DEIR whether the District used the same approach to calculate impact areas: Do the impact acreages listed in Tables 3.4-4, 3.4-5, and 3.4-6 include canopy area? The District should use a consistent approach to calculate impact and mitigation areas.

The final EIR should contain enough information in sufficient detail to demonstrate the adequacy of the mitigation strategy to mitigate impacts. This means that the final EIR should include a qualitative and quantitative analysis of all impacts to waters of the State and a demonstration that the proposed mitigation strategy and mitigation ratios will mitigate all impacts to waters of the State and their beneficial uses to less than significant levels.

11. Reach 6. The *Geomorphic Assessment and Recommendations for Portions of Llagas Creek Reach 6 from South of San Martin to North of Church Avenue Technical Memorandum* (September, 18, 2013; prepared by Balance Hydrologics, Inc.), addressed to Tim Harrison, includes several recommendations related to Project activities in Reach 6. The DEIR does not appear to address or incorporate these recommendations. The final EIR should address all studies and alternatives which could result in an improved project, and incorporate recommendations that improve the environmental value of the Project.
12. Cumulative Impacts. Central Coast Water Board staff appreciates that the cumulative impacts analysis includes a list of other past, current, and future projects in the Project vicinity. However, the analysis should include an evaluation of the following cumulative impacts:
  - An assessment of the cumulative effects of stream modifications resulting from channelization and flood improvement projects that have occurred over the years.

Santa Clara Valley Water District

- 7 -

February 25, 2014

- An assessment of encroachments and impacts on riparian areas associated with the listed projects.
- An assessment of cumulative water quality effects due to land use changes within the Llagas Creek watershed associated with the listed projects.

If we may clarify any of our comments or be of further assistance, please contact **Jon Rohrbough** at (805) 549-3458, or via email at [jrohrbough@waterboards.ca.gov](mailto:jrohrbough@waterboards.ca.gov), or Phil Hammer at (805) 549-3882.

Sincerely,



Digitally signed by Phillip Hammer  
Date: 2014.02.25 15:29:41 -08'00'

for  
Kenneth A. Harris, Jr.  
Executive Officer

P:\401\Projects\Santa Clara\Upper Llagas Creek\CEQA\DEIR\CCR\WQCB Comments on DEIR\_Upper Llagas Creek  
Project\_430114CQ01\_final.doc



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
<b>Oral Comments / Public Meeting</b>				
Dale Jelsema	1-1	NO	I am concerned that these maintenance roads would not be used for bicycles or motorcycles or ATVs. I am assuming the trails are mainly up in the Morgan Hill area and will not extend down to the rural San Martin area (Reach 4).	There are no plans for trails in the lower reaches because of the rural nature of the area. In the past, farmers have requested not to have trails in the area, and the SCVWD Board has respected that concern. In Reaches 7 and 8, which is urban Morgan Hill, the City is looking at different options for trails; but they will have to prepare a separate California Environmental Quality Act (CEQA) document to analyze the impacts and the SCVWD Board will also have to approve any development of trails as well.
Dale Jelsema	1-2	NO	Is the new island in Reach 4 going to be planted with vegetation for mitigation of the trees being removed upstream, and how are they going to be watered and maintained?	There is limited ground water in the Reach 4 area, so the revegetation in that area would be using plants that would not require much water. SCVWD will maximize the revegetation based on soil characteristics.
Virginia Anacleto	2-1	NO	In Reach 4 are the maintenance roads going to be gated to prevent motorcycles and cars from using the maintenance roads?	There will be locked gates with no trespassing signs posted on the public streets to prevent access to maintenance roads by vehicles and horses. They would have to trespass on other people's property or get into the creek and come up a bank to enter the maintenance roads.
Virginia Anacleto	2-2	NO	So it's not like a car would easily enter the maintenance road?	No, as the gates will be locked and posted, they will have to trespass on private property to gain entrance to the maintenance roads.
Amy Lawrence	3-1	NO	I back the airport in Reach 6 when the District starts cutting down the big tree line I am looking at 101. The District is removing 12 acres of trees and then replanting them in one particular area?	The Sycamore trees are not only being planted in one area. The SCVWD will plant sycamores where soil and hydrologic conditions will support sycamores, including parts of Reach 6.
Amy Lawrence	3-2	NO	How are you going to mitigate my view?	Some private views may be changed as a result of this Project. However, the visual character of the Project area would not change. The impacts on the private views of homeowners are not environmentally significant under CEQA and mitigation is not required. However, the SCVWD will replant the creek wherever work is done. Over time the vegetation will mature and the views will develop into a more dense vegetative view than before, because vegetation will be planted that is compatible with the existing soil conditions and available water resulting in more lush and less sparse vegetation than exists today.

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
Amy Lawrence	3-3	NO	Did I hear the creek was going to be cut off during the work?	West Little Llagas Creek floods at the intersection of Monterey and Watsonville Road because it is not big enough. The SCVWD is going to construct a new channel (Reach 7A) for the main flows instead of going to West Little Llagas. There will still be water in West Little Llagas from local drainage, but it should not overflow the channel as it does now.
Janet Tuttle	4-1	NO	In Reach 8, what is going to be done to prevent a deer from drowning or a child?	The SCVWD is not working on the channel in downtown Morgan Hill. The water will flow into a box culvert at the inlet structure across from Wright Avenue. The inlet will be secured with fencing. When flows get to a certain elevation, it will go over a weir and go into the tunnel. Low flows will still stay in the main channel. The NRCS Alternative would have had the steep concrete and vertical slope, which could have created problems with animals getting trapped and there would have been a lot more impacts in Reach 8, which is one of the reasons the Tunnel Alternative was selected.
Laura Chanjaran	5-1	NO	Is the channel going to go where the black pathway and bridge were recently built south of Watsonville Road?	The pedestrian bridge goes across West Little Llagas where the creek will be cut off. The pathway will be a maintenance road with gravel. The City will have to complete a CEQA document and request a Joint Trails Agreement through the SCVWD Board to have it repaved.
Laura Chanjaran	5-2	NO	Will the City have to come in and redo the path at Lake Silveira?	This Project will result in gravel maintenance roads on both sides, which people are going to use to walk.
Laura Chanjaran	5-3	NO	Why is it necessary to convert Lake Silveira to marshland?	Lake Silveira was identified as a major on-site mitigation element by U.S. Fish and Wildlife Service (USFWS) in the 2003 Coordination Act Report (CAR). Lake Silveira provides an opportunity to develop a large area of contiguous wetlands, and being next to the 3 acres of open water, which will remain, and will provide important habitat for local wildlife. The Resource agencies want to see the main stem of the existing channel re-established to help with the water quality, which is currently poor in the Lake.
Laura Chanjaran	5-4	NO	Will the public still have access to all of the land in the Lake Silveira area?	Yes, access for the public will remain along the existing path from Monterey Road.



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
Robert Cerruti	6-1	NO	What do you think it will take to get the 146 parcels to start the project, two to three years?	SCVWD is targeting May 2015 to obtain all of the parcels required for the Project. Ideally, 40 parcels will be acquired for the first phase of construction in the next 6 months.
Robert Cerruti	6-2	NO	The horsemen riding horses back and forth up and down the creek in Reach 14 are going to disrupt the bank. What are you going to do to stop them.	Some of the vegetation that will be planted will deter some of the people from riding horses in the area and trespassing signs will be posted.
Robert Cerruti	6-3	NO	The District is going to put these plants in and then the horsemen are going to go there and start tearing the plants up.	SCVWD will be revegetating and monitoring for revegetation success. There will be performance criteria that the SCVWD must meet to ensure successful revegetation because that is a mitigation requirement.
Robert Redfern	7-1	NO	Three of four times a week I ride the bike trail that runs from Watsonville Road all the way up to Spring Street. Are you going to tear out that entire piece while you do construction?	A large portion of the trail will be removed during construction. During construction there will be detour signs. A gravel road will replace the asphalt. The City has the option to pave it, but there may be a lag period between the gravel and the asphalt paving.  The City will have to complete a CEQA document and request a Joint Trails Agreement through the SCVWD Board to have it repaved.
Laura Chanjaran	5-5	NO	When are you going to be notifying the neighbors in the area of construction?	SCVWD wants to get all property acquired by 2015. SCVWD is planning to start construction in Phase II by summer 2016, but it may be summer 2017. There will be announcements to neighbors and the public in the months and weeks leading up to the start of construction.
<b>Individual Comments</b>				
Robert Redfern	RR-1	NO	The alternative plan that you considered and rejected were given short shrift including one that involved shunting flood waters over the area /east of 101. I looked up the DEIR and could not find an alternative plan that involved moving water over to the other side of 101.	An alternative was included that would take high flows out of the Llagas main stem and divert it to East Little Llagas Creek under U.S. Highway 101 (U.S. 101) (Reach 6 Bypass Alternative). This alternative is fully described in Section 2.8. The EIR evaluated all four action alternatives to an equal level, which goes beyond the standards for CEQA.

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
Robert Redfern	RR-2	NO	The plan did not discuss how the buildup of silt would be dealt with after the project is built. The existing creek and infrastructure did not take this into account	Section 2.4.5.2 discusses how sediment will be managed during operations and maintenance. At the confluence of Reaches 14, 4, and 5, the design includes a widened channel area with a mid-channel bar that bifurcates the flow. This site is designed for sediment accumulation to help reduce the need for sediment removal in downstream locations. A similar sediment depositional site is designed for an over-widened channel area in Reach 6. It is anticipated that sediment removal at both of these sites will be less frequent than once every 10 years. Additionally, a sediment trap is incorporated as part of the design in Reach 8.
Linda Hayes	LH-1	NO	We are aware of the proposal to acquire a portion of our property in the interest of realigning the Llagas Creek channel and constructing the associated maintenance road. Our concern relates to the ultimate disposition of a very large, extremely old heritage Valley Oak tree located where our property line meets the creek bank. It has recently been brought to our attention that a number of trees are scheduled for removal as a function of this project and we wish to go on record in strong opposition to any plans to eliminate this tree. As we understand it, the realignment project will leave this portion of the creek intact, ostensibly to be used simply as an overflow channel running parallel to the proposed new channel. No improvements are scheduled to the existing channel which further supports the premise that existing vegetation should remain undisturbed in the interest of bank stabilization and retention of valuable botanical resources. If this particular tree is not scheduled for removal, we would greatly appreciate your firm affirmation of that fact.	The Proposed Project would not be removing this tree or many others along this section of Llagas Creek. SCVWD took efforts to avoid existing vegetation where possible.
Dale Jelsema	DJ-I-1	NO	How will SCVWD provide night time security or road patrols of the maintenance roads?	There will be locked gates with no trespassing signs posted on the public streets to prevent access to maintenance roads by vehicles and horses.



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
Dale Jelsema	DJ-II-1	YES	In Section 3.14.2.2, need to add another well (new total of 12) that are within 12 feet of the creek. I will give permission to SCVWD to get a well removal company to use my road and cross my land to remove the well and seal the well site.	The text will be revised and the well will be capped.
Dale Jelsema	DJ-II-2	NO	The risk of maintenance road trespassers starting fires on ranch lands, theft and damage to equipment, trucks etc. goes way up	The concern about trespassers using the new road is acknowledged. While there is the potential for all private roads in any area to allow for access by unauthorized persons, such access can be minimized by SCVWD with locked gates across the road and no trespassing signs posted.
Dale Jelsema	DJ-II-3	NO	Will Cal Fire have to open the access gates to these new roadways?	California Department of Forestry and Fire Protection (Cal Fire) will be provided a key to the access gates.
Dale Jelsema	DJ-II-4	NO	We do not want the new maintenance road to be used as the start of a new future trail system mainly due to fire, theft, and property trespassing issues.	There are no plans for trails in the lower reaches because of the rural nature of the area. In the past, farmers have requested not to have trails in the area; and the SCVWD Board has respected that concern.
Dale Jelsema	DJ-II-5	NO	In some parts of your project whole creek banks are being clear cut of all trees. Is this need to this extent? Has CDFW totally signed on to this?	The widening of the creek requires all the vegetation to be removed, but it is only being done on one side in most cases. The side varies depending on the amount of mature vegetation that exists at a specific location. The mature vegetation side will be avoided for the widening. CDFW has jurisdiction over the vegetation on the creek banks and SCVWD will obtain permits from them prior to constructing this Project.
Dale Jelsema	DJ-II-6	NO	Why clear cutting of both creek banks along Reach 4?	Clear cutting is not occurring on both banks in Reach 4. The widening of the creek requires all the vegetation to be removed but it is only being done on one side, in most cases, including Reach 4. The side of the creek being used for widening varies depending on the amount of mature vegetation that exists at a specific location. The mature vegetation side will be avoided for the widening.
Mike Monroe	MM-1	NO	My concern is assimilation of the Lake Silveira property into the final planning document as a community park with a lineary multipurpose trail.	Lake Silveira is not a sanctioned park; although, there are people who use the path from Monterey Road to Lake Silveira. SCVWD will not be making this a park. The County and/or Morgan Hill could consider making it a park in the

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
				future. This Project will result in gravel maintenance roads on both sides of Reach 7A, which could potentially be converted to a multipurpose trail with the coordination of the City of Morgan Hill. The City is looking at different options for trails, but they will have to prepare a separate CEQA document to analyze the impacts; and the SCVWD Board will also have to approve the development of trails, as well.
<b>Agency Comments</b>				
CDFW	CDFW-1	YES	Appendix C, Page C-10, CDFW recommends that the BMP WQ-10 be revised to state that wet sacked concrete and poured concrete will be excluded from the wetted channel for a minimum of 30 days after installation. A period of less than 30 days may be acceptable upon use or a commercial sealant once the sealant has dried.	<p>The BMP has been modified to state that concrete will be excluded from the wetted channel for a period of 30 days if an appropriate sealant is not used:</p> <ol style="list-style-type: none"> <li>1. Wet sacked concrete will be excluded from the wetted channel for a period of 30 days after installation. During that time, the wet sacked concrete will be kept moist (such as covering with wet carpet) and runoff from the wet sacked concrete will not be allowed to enter a live stream.</li> <li>2. Poured concrete will be excluded from the wetted channel for a period of 30 days after it is poured. During that time, the poured concrete will be kept moist, and runoff from the wet concrete will not be allowed to enter a live stream. Commercial sealants (e.g., Deep Seal, Elasto-Deck Reservoir Grade) may be applied to the poured concrete surface where difficulty in excluding water flow for a long period may occur. If a sealant is used, water will be excluded from the site until the sealant is dry.</li> <li>3. Dry sacked concrete will not be used in any channel.</li> <li>4. An area outside of the channel and floodplain will be designated to clean out concrete transit vehicles.</li> </ol> <p>This information will be included in the Mitigation Monitoring and Reporting Program (MMRP).</p>
CDFW	CDFW-2	NO	Pages S-22 and 3.5-20 CDFW recommends that SCVWD apply for a 2081(b) ITP for tiger salamander	Comment noted. SCVWD will apply for a 2081(b) Incidental Take Permit (ITP) for tiger salamander.



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CDFW	CDFW-3	YES	Page 2-72 During dry-year or drought conditions, CDFW recommends that base flows remain in the historic channel to maximize benefits to rearing habitat for the South/Central Coast Steelhead	SCVWD has been working with National Marine Fisheries Service (NMFS) on the design of the Lake Silveira mitigation element. They have similar concerns with the split of flows between the proposed wetland and restored channel. Based on this feedback, the FEIR is revised to state that low flow will be split first to the restored channel before going to the wetlands. SCVWD will continue to work with NMFS and the other Resource agencies in the final design of Lake Silveira.
CDFW	CDFW-4	NO	Page 2-72 CDFW recommends that the SCVWD expand on the discussion in the DEIR pertaining to the flow split to Lake Silveira and include discussion of the comments and questions brought forth by NMFS in their comment letter dated January 16, 2014.	
CDFW	CDFW-5	NO	Page 2-89 of the DEIR is not clear as to whether the RCP is proposed to be placed in the channel, converting an earthen channel to RCP and thus resulting in a net-loss of 2,400 feet of earthen channel or whether the RCP would be placed adjacent to the channel beneath Hale Avenue.	Section 2.5.1, Page 2-84, states "Replace approximately 2,200 feet of the existing creek between Main Avenue and Wright Avenue with two 10-foot wide by 7- to 8-foot deep reinforced concrete box culverts following the existing stream alignment, but under Hale Avenue". As such, the section of earthen channel along Hale Avenue will be replaced with culvert. This is shown in Figure 2.5-1 and in Table 2.5-1.
CDFW	CDFW-6	NO	Page 2-89 If there will be a loss of earthen channel, the DEIR should be revised to include appropriate mitigation for the permanent loss of earthen channel.	Mitigation Measure BOT-1c T, Prepare Revegetation Monitoring and Mitigation Plan, includes mitigation for the loss of vegetation along the channel. The Project is adding more earthen channel than is being removed (i.e., the 1.25-mile bypass channel segment in Reach 7A and 1,980-linear feet around Lake Silveira), so mitigation is not necessary for the loss of earthen channel.
CDFW	CDFW-7	NO	Pages 3.4-5, 3.4-17, and 3.4-36 Conducting non-protocol level botanical surveys during a seasonal period when the species would be difficult if not impossible to identify does not constitute a survey effort adequate to demonstrate absence of a sensitive plant species which could be impacted during implementation of the project.	The SCVWD concurs and that is why pre-construction protocol level surveys are required prior to the start of construction by Mitigation Measure BOT-1a T.
CDFW	CDFW-8	YES	Pages 3.4-5, 3.4-17, and 3.4-36 CDFW recommends that the DEIR be revised to include the CNPS listing of these four plant species	The California Native Plant Society (CNPS) plant listings for the four species (big-scale balsamroot [1B.2], Loma Prieta hoita [1B.1], fragrant fritillary [1B.2], and arcuate bush-mallow [1B.2]), has been added to the FEIR.

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CDFW	CDFW-9	NO	Pages 3.4-5, 3.4-17, and 3.4-36 CDFW also recommends that the DEIR be revised to the state that protocol-level surveys will be conducted for any state listed plant species that could occur within the project area.	The EIR acknowledges that "protocol" level plant surveys were not conducted. A habitat assessment was conducted and determined that four species (Big-scale balsamroot, Loma Prieta hoita, Fragrant fritillary, and Arcuate bush-mallow) could occur in the Project footprint. While the occurrence of these species is considered unlikely, the EIR includes a mitigation measure to survey for them, following appropriate protocols (see Mitigation Measure BOT-1a T) and to mitigate for them if they are present and not avoidable (see Mitigation Measure BOT-1b T). No other state listed plant species were determined to be possibly located in the Project footprint.
CDFW	CDFW-10	YES	Pages 3.4-5, 3.4-17, and 3.4-36 Minimizing impacts to sensitive plant species during the "sensitive" cycles of the plant species would not constitute take avoidance. The DEIR should include adequate mitigation for any impact to listed and sensitive plant species.	The statement "minimizing impacts to sensitive plant species during sensitive cycles" along with all references to BMP BI-12 have been removed in the FEIR, because the protections for sensitive plants are included in Mitigation Measures BOT-1a T and BOT-1b T. It is clearly stated in BOT-1b T: "If special status plants cannot be avoided, compensatory mitigation for unavoidable impacts will be preservation or creation".
		NO	Pages 3.4-5, 3.4-17, and 3.4-36 Additionally the DEIR should include adequate mitigation for any impacts to listed and sensitive plant species	Mitigation Measures BOT-1a T and BOT-1b T provide for mitigation for impacts to listed and sensitive plant species.
CDFW	CDFW-11	NO	Pages 3.4-26 and 3.4-32 Please be advise that if the project site is not restored to pre-project or better conditions within one year of the impact then CDFW does not consider the impacts to be temporary	SCVWD recognizes that long-term impacts are typically considered permanent. Only locations where the vegetation is herbaceous and is expected to grow back rather rapidly were identified as temporary impacts. This would include grasslands and marsh habitats, which are both expected to recover in a year. In addition, the Lake Silveira mitigation element and the lower section of Reach 7A are expected to establish new wetlands as part of Phase 1 of construction. Most impacts to wetlands would occur later in Phase 2.
CDFW	CDFW-12	NO	Page 3.4-32, Table 3.4-4 CDFW recommends that the impacts presented in this Table 3.4-4 be revised to fully describe all impact to vegetation types and habitat with CDFW 1600 jurisdiction including impacts associated with riprap, access ramps and other design features.	At the time of the EIR development, the detailed information for those features had not been determined but it will be included in the permit applications.



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CDFW	CDFW-13	YES	Page 3.4-33, Table 3.4-6 Please explain why the impacts described under the riparian forest and riparian scrub shrub in Table 3.4-6 are not considered to be within CDFW 1600 jurisdiction.	<p>Table 3.4-6 will be revised to indicate the forested areas outside of the CDFW jurisdiction are not riparian. The forested and scrub-shrub areas outside the CDFW boundary were inadvertently mis-categorized as riparian. Although the Project was mapped using the SCVWD habitat types (AIS), for purposes of the Draft EIR, the USFWS CAR habitat types were utilized for impact analysis since it was the framework of the mitigation. However, the CAR habitat types did not have any forest type other than riparian forest and riparian scrub-shrub, so we retained these categories to remain consistent with the CAR. This was a mistake because they are not riparian areas. In the assessment of the limits of CDFW jurisdiction, it was assumed that everything within the existing bed and banks of Llagas Creek is within CDFW jurisdiction. In addition, when the existing tree canopy extended from within the bed and banks to outside of the bed and banks, we extended the limits of CDFW jurisdiction to the outer (upland side) of the tree canopy. Any vegetation outside of CDFW jurisdiction (as defined above) was not considered riparian.</p> <p>Consequently, the mapping is being revised to two new mapping categories: "Upland Forest/Woodland" (UF/W) consists of scattered individual trees and "Upland Scrub" (U/S) consists of uncommon patches of coyote brush (<i>Baccharis pilularis</i>) and many non-native shrubs. The larger trees that are a component of the "Upland Forest/Woodland" likely established when there was a connection to flow and channel processes, and would have likely been within what is defined as CDFW jurisdiction at that time. However, Llagas Creek has incised significantly over decades leaving these areas "high and dry" so that they are well above the channel and disconnected from channel flow and processes. Therefore, these areas are now outside of current CDFW jurisdiction and as a result are no longer considered riparian habitat. The UF/W and U/S categories more accurately describes the characteristics of these forested and scrub-shrub areas, which fall outside the CDFW jurisdiction. As such, there is no riparian vegetation (Riparian Forest [PFO] or Riparian Scrub-Shrub [PSS]) outside of the CDFW jurisdiction.</p>

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CDFW	CDFW-14	YES	Page 3.4-38 DEIR does not address specific mitigation ratio for wetland impacts.	SCVWD has not yet completed an impact analysis for 90-percent design. However, Mitigation Measure BOT-1c T is updated to reflect that the proposed ratio for replacement of wetlands is 1:1 for temporary impacts and 2:1 for permanent impacts.
CDFW	CDFW-15	YES	Page 3.4-38 CDFW recommends a 3:1 mitigation ratio of wetland and woody riparian impacts that will not be restored to pre-Project conditions or better within one year.	The goal of the mitigation strategy is to improve the functions and values of the degraded stream corridor. Items for Project design include: a stable bankfull channel design; instream complexities; removing an illegal impoundment and creating a mosaic of wetlands on the valley floor; cleaning up legacy trash and debris; removing road crossing through the active stream channel; removing invasive vegetation, which has led to the homogenization of the riparian habitat; and a revegetation strategy, which will be self-sustaining and successional given the soil and hydrologic conditions within the watershed. The mitigation strategy will effectively make the Llagas Creek better wildlife habitat post construction. The SCVWD looks forward to working with CDFW on the mitigation recommendations.
CDFW	CDFW-16	NO	Page 3.4-38 It is unclear why mitigation is proposed for vegetation that will not be removed and what the basis is for a reduction in mitigation ratio by 33%?	Per previous guidance provided by the resource agencies, SCVWD is utilizing the habitat mitigation approach that is described in the CAR to the extent feasible. The Habitat Evaluation Procedure analysis that the CAR is based on reduces the Habitat Suitability Index of impacted vegetation by 40 percent when the majority of the plant canopy closure (cover) is made up of non-native species. Therefore, the EIR utilized that 40-percent reduction in an adjustment of mitigation ratios for non-native PFO and PSS. Independent of the CAR directive as just described, the Project design team considered habitat values for native PSS under PFO canopy, and proposes that a 33-percent reduction in mitigation ratios would reflect that fact that only understory was removed, compared with areas where both overstory and understory were removed.



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CDFW	CDFW-17	YES	Page 3.4-38 CDFW recommends monitoring West/East Little Llagas creek beginning in Year 3 or earlier to determine if there is a loss of riparian habitat resulting from changes to channel hydrology.	Mitigation Measure BOT-1d T has been clarified that vegetation monitoring will occur in Years 3, 6, and 10 after West/East Little Llagas is cut off from upstream flows and that compensatory mitigation will be required at any time during the monitoring period if changes are detected from altered hydrology.
CDFW	CDFW-18	NO	Page 3.4-39 CDFW recommends that the DEIR be revised to characterize impact to wetland according to the definitions of temporary and permanent.	Most impacts to U.S. Army Corps of Engineers (USACE) jurisdictional areas are to perennial and intermittent streams, which will be restored as soon as construction is complete. In regards to wetlands, SCVWD conducted a 3-year study: <i>Instream Wetland Vegetation Regrowth Study</i> , which indicated that vegetation removed from a nontidal wetland can fully revegetate in the course of a year (SCVWD 2002), so the EIR assumption regarding temporary impacts remains.
CDFW	CDFW-19	NO	Page 3.5-12 State Candidate Species are also subject to the same protection as State endangered and threatened species. Please revise DEIR accordingly.	No candidate species are known or expected to occur within the Project limits. Townsend's big eared bat is addressed in Comment CDFW-22 below and comments do not suggest any other candidate species that should be addressed.
CDFW	CDFW-20	YES	Page 3.5-12 CDFW will assume presences of the species if protocol-level surveys have not been conducted to confirm absence.	The text has been revised to include more detail about the methods used to determine potential presence. For those species that list habitat presence, dispersal barriers were checked.
CDFW	CDFW-21	NO	Page 3.5-12 The most updated CNDDDB and USFWS lists should be reviewed prior to submitting permit applications.	The California Natural Diversity Database (CNDDDB) and USFWS lists will be reviewed prior to permit submittal.
CDFW	CDFW-22	NO	Pages 3.5-13, 3.5-54, and 3.5-56 There is no mention of the State Candidate Townsend's big eared bat. Please indicate whether project impact have been considered for this species.	On January 4 and 11, 2013, SCVWD had 10 bridges and 10 culvert structures surveyed on Upper Llagas Creek for potential bat roosting habitat (H.T. Harvey & Associates 2013e). There is no potential for Townsend's big-eared bats to day-roost on any of these bridges. It is possible that occasional Townsend's big-eared bats could occur in the Llagas Creek watershed, particularly in the upper part of the watershed upstream from the Project area. A few individuals could potentially roost in the Project vicinity in the attics of old buildings. However, all available evidence indicates that this species is very rare in Santa Clara

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
				County, and that occurrence away from mines (such as at Almaden Quicksilver County Park) in the County is primarily by dispersant males from coastal breeding areas, where the species apparently breeds in old-growth redwood snags.
CDFW	CDFW-23	NO	Pages 3.5-26 and 3.5-52–3.5-53 Please be advised that since the Upper Llagas Creek Flood Protection Project is not covered activity identified under the Santa Clara Valley Habitat Plan if the project will result in take of a state-listed species, SCVWD will need to apply to CDFW for an ITP.	Comment noted. SCVWD will apply for a 2081(b) ITP for tiger salamander and it is acknowledged this Project is not covered under the Santa Clara Valley Habitat Plan (Valley HP).
CDFW	CDFW-24	YES	Pages 3.5-26 and 3.5-52–3.5-53 CDFW recommends that the DEIR be revised to describe any potential direct or indirect impact to salamander breeding and/or upland habitat that may occur from implementation of the project and include appropriate mitigation for any such impacts	WILD-2 T, Page 3.5-49, describes indirect and direct impacts on the tiger salamander. There is no breeding habitat in the Project area and the text has been revised. Mitigation Measure WILD-2d T, Page 3.5-53, describes the mitigation, which is revised to be compensatory mitigation outside of the Valley HP. During consultation for the 2081(B) ITP, the final design will be used to quantify impact to habitat.
CDFW	CDFW-25	YES	Page 3.5-61 Please be advised that CDFW is unlikely to approve trapping and relocation of wood rats. CDFW is willing to work with SCVWD to develop a nesting material relocation, enhancement and monitoring plan to minimize impact to this species.	The mitigation has been modified to state SCVWD will work with CDFW to develop a nesting material relocation, enhancement, and monitoring plan to minimize impact to this species.
CDFW	CDFW-26	YES	Page 3.6-29 Please clarify if the reference to three meters for fall heights is a typo and whether this should be revised to say fall heights of less-than three feet for Mitigation Measure AQUA-1a T	The reference to velocities and fall heights in the paragraph referred to the velocities and jumps that some adult steelhead are capable of overcoming during their upstream migration. These values are correct, but misplaced, as they do not reflect the values suggested in the guidelines (NMFS 2008; Flosi et al. 2010). The guidelines are intended to provide passage for the vast majority of steelhead, not just the most athletic individuals. The values in question were removed from the report and the appropriate guidelines for fish passage were better referenced.



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
VTA	VTA-1	YES	In sections where the trails are closed to pedestrians and bicyclist permanently or temporarily, the closing should be posted 30 days in advance and the detour routes should be designed in conformance with the VTA Bicycle Technical Guidelines (BTG).	Mitigation Measure REC-1a T has been revised to include the 30-day posting period in advance of construction, which is consistent with the Bicycle Technical Guidelines (BTG).
VTA	VTA-2	NO	If the alternate route is a significant increased distance or travel time compared to the trail, consideration should be given to allowing pedestrians and dismounted bicyclist to continue to share the pathway as discuss in the BTG.	The trail will not be available during construction due to public safety issues. After construction, SCVWD will work with Morgan Hill to reestablish access along the creek.
CALTRANS	CALTRANS-1	NO	The Traffic Impact Study (TIS) Guideline is a starting point for collaboration between the lead agency and Caltrans in determining when a TIS is needed.	The guidelines will be reviewed prior to any required consultation with California Department of Transportation (Caltrans).
CALTRANS	CALTRANS-2	NO	SCVWD is responsible for all project mitigation including any needed improvements to State Highways. The project's financing, scheduling, implementation responsibilities and lead agency monitoring should be fully discussed for all proposed mitigation measures. This information should be presented in the Mitigation, Monitoring and Reporting Plan of the environmental document.	The EIR analysis concludes that there are no significant impacts from this Project on State highways; therefore, there are no mitigation measures addressing improvements to State highways.
CALTRANS	CALTRANS-3	NO	If it is determined that traffic restrictions and detours are needed on or affecting State highways, a Transportation Management Plan (TMP) or construction TIS may be required of the developer for approval by Caltrans prior to construction.	Traffic studies have been developed analyzing worse-case scenarios and it was determined that there would not be significant impacts to State highways. Once a construction contractor is under contract for the Project, Caltrans procedures will be followed to obtain any necessary permits.
CALTRANS	CALTRANS-4	NO	Project work that requires movement of oversized or excessive load vehicles on State roadways requires a transportation permit that is issued by Caltrans.	Comment noted. The SCVWD acknowledges that a transportation permit may be needed for this Project.

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CALTRANS	CALTRANS-5	NO	Please be advised that any work or traffic control that encroaches on the State ROW requires an encroachment permit that is issued by Caltrans.	Comment noted. The SCVWD acknowledges that an encroachment permit may be needed for this Project.
NMFS	NMFS-1	YES	Page 3.6-7 We recommend the SCVWD review and adopt comments from our January 16, 2014 letter and focus the majority of instream flows down the historical channel, rather than bifurcating the stream flow through both the historical channel and Lake Silveira.	The design has been modified to address the comments in the letter. The EIR is revised to state the low flow will be split first to the restored channel before going to the wetlands.
NMFS	NMFS-2	YES	Page 3.6-12 The EIR state " Casagrande (2011) also observed five YOY near the Llagas Avenue Bridge (Reach 6) in 2010." This statement is incorrect. According to Cassagrande (2011) in 2010, the five O. mykiss found were at the Llagas Road site (the first Bridge below Chesbro Reservoir).	Comment noted. The text has been revised.
NMFS	NMFS-3	YES	Page 3.6-12 The Magnuson-Stevens Fishery Conservation and Management Act (MSA) does not apply to the project area. Steelhead is not a commercially harvested species and therefore, Llagas Creek does not contain Essential Fish Habitat as defined by MSA.	Comment noted. The text has been revised.
NMFS	NMFS-4	NO	Page 3.6-29 We recommend the SCVWD meet with NMFS to discuss issues and concerns over the criteria and rationale behind proposed instream structures in Llagas Creek. Specific questions arose regarding velocities with the project area, spacing and composition of large wood structures, and goals for the habitat features in context to steelhead migrations.	SCVWD has actively engaged with NMFS soliciting input for the Llagas Project design, as follows: 8/2/12: Requested review at 30-percent design meeting. 8/20/12: 30-percent woody debris sheets were pulled from the larger 30-percent design review package and sent to NMFS to provide review and comment. 10/24/12: Follow up email from SCVWD to NMFS to check in on review of design of the instream complexity component of the Project. 10/31/12: NMFS requested the sheets for review. 11/5/12: SCVWD resent the sheets. 2/11/13: Email sent to NMFS inquiring about the status of review.

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
				<p>6/25/13: Requested review of 65-percent design at meeting when overview of design was presented.</p> <p>11/18/13: Requested review from NMFS staff at mitigation strategy meeting.</p> <p>No input was received from these invitations on the review that the SCVWD requested. The SCVWD understands the need to obtain concurrence from NMFS on the design to acquire necessary permits for the Project. SCVWD is ready to engage with NMFS and consult on the Project design at any time.</p>
NMFS	NMFS-5	NO	Page 3.6-29 Installation of instream habitat features will require ongoing monitoring and maintenance to ensure they function as designed.	The SCVWD concurs that instream habitat features will require ongoing monitoring and maintenance. The required maintenance will be built into maintenance guidelines developed as part of the final design.
NMFS	NMFS-6	NO	Page 3.6-29 We disagree that "implementation of Mitigation Measure AQUA-1a would reduce impact to less than significant."	<p>We respectfully disagree with the NMFS's assertion that implementation of Mitigation Measure AQUA-1a T would not reduce impacts to less than significant. We agree with NMFS that Llagas Creek is "significantly adversely impacted by past and ongoing land and water use practices" and as such the channel is incising with unstable bed and banks and no natural regeneration of riparian vegetation. Without this Project, the current trend of degradation would continue including proliferation of invasive plant species, which continue to homogenize the corridor, legacy trash and debris on stream banks, opportunistic armoring of stream banks with concrete rubble, illegal road crossings through the creek, and unauthorized use of herbicides and vegetation clearing. Purchasing of private land converting it to public ownership should alleviate a lot of the deleterious activities, which has contributed to the current conditions on the valley floor. Additionally, the stable bankfull channel design, control of invasive vegetation, installation of instream complexity, and reestablishing the stream channel around Lake Silveira should vastly improve conditions for steelhead within the watershed over the existing condition.</p>



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
NMFS	NMFS-7	YES	Page 3.6-29 We are concerned measures to minimize impact to large wood in the channel will be difficult to implement and the language is sufficiently vague so that removal and modification could be justified under almost any circumstance.	<p>Since 2001, the SCVWD has successfully implemented a four-tiered, multi-disciplined approach to address the range of issues that Large Woody Debris (LWD) can pose in a channel.</p> <ol style="list-style-type: none"> <li>1. Evaluate the wood to determine risk of leaving in place and determine aquatic habitat value;</li> <li>2. Modify the wood while retaining the habitat value;</li> <li>3. Move the wood to another location; and</li> <li>4. Remove wood entirely and mitigate elsewhere in the watershed.</li> </ol> <p>The assessment of LWD is performed by an engineer, biologist, and field operations administrator. Mitigation is only required for Tier 4, Remove LWD. This existing approach used by the SCVWD to address LWD will be incorporated into the FEIR, and it remains in effect as part of the Project maintenance, in addition to Mitigation Measure AQUA-1b T: Steelhead Passage: Inspection of In-channel Large Woody Debris prior to Removal for Management of Flood Conveyance Channels. Mitigation Measure AQUA-1b T requires establishing a size criteria for LWD, above which size the LWD would be subject to the inspection and evaluation process described here.</p>
CCRWQCB	CCRWQCB-1	YES	Page 1-7 the Project purpose is misstated. It should read that the purpose of the proposed Project is to provide 10-year flood exceedance capacity on Reach 14, not on East Little Llagas.	Agreed. The EIR has been revised to indicate the 10-year flood capacity is for Reach 14.
CCRWQCB	CCRWQCB-2	NO	Page 2-52 In-channel construction work will occur during the dry season (May 1 through October 15). Central Coast Water Board staff plans to require that construction activities within top of bank (as defined by the figure on p. Glossary-15 of the 2014-2023 Stream Maintenance Plan Manual) be limited to the period between June 1 and September 30, unless the District obtains prior approval for work outside of that time period.	This is a capital improvement project rather than ongoing maintenance where the May 1 to October 15 work window is used. Shortening the work window by 6 weeks would create more impacts because the timeline of construction would be extended for the Project. Other than Reach 6, Project reaches are dry for most of the year, so the longer work window will not result in increased work in wetted channels.

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CCRWQCB	CCRWQCB-3	YES	The DEIR does not appear to include a description of how disturbed creek channels will be winterized each year to protect them against erosion and other water quality problems. To demonstrate that this impact will be mitigated to less than significant levels, the FEIR should include such a description	The FEIR has been revised to state that the disturbed creek channels will be winterized as specified in the agency approved Project Stormwater Pollution Prevention Plan (SWPPP). In addition, existing BMPs (see Hydrology and Water Quality, Page 3.2-19), which also apply throughout the winter period, will be implemented to manage erosion and protect from sediments entering the channel during construction.
CCRWQCB	CCRWQCB-4	NO	Operations and maintenance procedures described in Section 2.4.5 of the DEIR should be consistent with the 2014-2023 Stream Maintenance Program and the San Francisco Bay Regional Water Quality Control Board's Draft Waste Discharge Requirements and Water Quality Certification for Santa Clara Valley Water District Stream Maintenance Program dated February 10, 2014.	The description of operations and maintenance procedures is specific to the capital improvement Project, and is not the same as the 2014–2023 Stream Maintenance Program (SMP) nor analyzed during the SMP permitting process. However, the maintenance guidelines for this Project will follow the guidelines for the SMP, and in most cases the proposed maintenance activities are the same as or very similar to those activities in the SMP.
CCRWQCB	CCRWQCB-5	YES	Table 3.2-1 of the DEIR is confusing. The table indicates that the design flow for Reaches 4, 5, and 6 is equal to the 10-year return period flow. However, the project description indicates that these Reaches will be designed only to avoid increased flooding induced by upstream modifications.	Table 3.2-1 has been revised to indicate Reaches 4, 5, and 6 will be designed to avoid increased flooding induced by upstream modifications, and not the 10-year discharge.
CCRWQCB	CCRWQCB-6	YES	Page 3.2-6 From the 2010 integrated report (SWRCB 2010), there are two specific areas within Llagas Creek where water quality has been identified as impaired: Reach 14 and downstream of Reach 4." Impairments listed for Llagas Creek below Chesbro Reservoir (chlorpyrifos, electrical conductivity, E. coli, low dissolved oxygen, and turbidity) are within the project footprint and should be discussed in the FEIR.	The impairments identified in the comment (chlorpyrifos, electrical conductivity, <i>E. coli</i> , low dissolved oxygen, and turbidity) have not been left out, they are identified on Page 3.2-7. However, the text states that these parameters are "without specified locations on Llagas Creek". The FEIR is revised to indicate that the locations for these impairments are below Chesbro Reservoir (Reaches 4, 5, and 6).

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CCRWQCB	CCRWQCB-7	YES	The DEIR does not address the potential post-project water quality impact of constructing Reach 7A or identify mitigation measure to prevent the discharge of agricultural pollutants into Reach 7A or identify mitigation measure to prevent the discharge of agricultural pollutants into Reach 7a to less than significant levels. Central Coast Water Board staff assumes that the District will retain ownership of Reach 7A and will therefore have authority to control pollutant discharges.	The Project team will modify the design of Reach 7A to incorporate drainage swales or similar design features, where appropriate, to ameliorate the discharge of agricultural pollutants into the new active creek channel. The Central Coast Regional Water Quality Control Board (CCRWQCB) is correct to presume that ownership of the Project, including this reach, will be retained by the SCVWD; and as such, staff will ensure that surface water and beneficial uses are protected to the extent feasible.
CCRWQCB	CCRWQCB-8	NO	Page 3.2-26 states the channel modification activities in Reach 6 will encroach upon a closed landfill. This encroachment constitutes a potential water quality impact that should be identified as such in the FEIR, and the FEIR should identify mitigation measure to reduce the impact to less than significant levels.	This Project will likely run into areas that contain potentially contaminated soils, including the mentioned closed landfill in Reach 6. Although each area with potential contamination was not addressed separately in the EIR, Mitigation Measures HAZ-2b T, HAZ-2e T, and HZA-2f T all address impacts of channel modifications overlapping with contaminated soils for the protection of workers and the environment. The preliminary plan for the landfill is to cap and isolate the landfill from the channel. SCVWD will work with the CCRWQCB on the details once the final design is complete.
CCRWQCB	CCRWQCB-9	NO	The DEIR also states any planning of any ground disturbance work within the identified parcel (landfill) requires consultation with the Central Coast Water Board Staff. If the consultation with Central Coast Water Board staff has already occurred, the FEIR should describe how it took place and the results of the consultation and all requirements imposed by the Central Coast Water Board staff on ground disturbance activities within the identified parcel should be included in the FEIR as mitigation measures. If the consultation has not occurred it should take place prior to completion of the FEIR so that all requirements imposed by the Central Coast Water Board Staff can be included as mitigation measures.	The extent to the disturbance in the area of the landfill will be determined in the final design of the Project. Consultation with CCRWQCB staff would occur at that time and the requirements imposed would be included in the conditions of the permits required prior to initiating construction of the Project.



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CCRWQCB	CCRWQCB-10	YES	Tables 3.4-4, 3.4-5, and 3.4-6 identify impacts within the USACE and CDFW jurisdictional areas, but do not specifically identify impacts to waters of the State. The FEIR must clearly identify all waters of the State and all impacts to those waters to ensure that all project impacts are adequately addressed and mitigated to less than significant levels.	Tables 3.4-4, 3.4-5, and 3.4-6 are revised to indicate that CDFW jurisdiction includes waters of the State.
CCRWQCB	CCRWQCB-11	NO	The FEIR should include a more detailed discussion and quantification of Project impacts to West Little Llagas Creek-East Little Llagas Creek (WLLC-ELLC) resulting from the Project's diversion of flow from WLLC to Llagas Creek through Reach 7a. Potential impacts that should be assessed should include but are not limited to the potential increase in concentrations of urban and agricultural pollutants in WLLC-ELLC (and Reach 14) resulting from the fact that nearly all of the flow in WLLC-ELLC will consist of local runoff.	The section of West Little Llagas/East Little Llagas cut off from upstream flows would not have an increased concentration of urban pollutants because the area is not densely populated. In addition, the diverted water from Reaches 7B and 8 would have more urban influence and could be more concentrated with pollutants than the runoff in the West Little Llagas Creek-East Little Llagas Creek (WLLC-ELLC) area. The EIR discusses potential impacts to this segment of creek in Hydrology and Water Quality (Section 3.2.5.2) and Botanical Resources (Section 3.4.5.2). The analysis is based on a number of technical memos prepared by SCVWD, which are referenced in the EIR and are available upon request. The EIR concludes that impacts to habitat and beneficial uses in WLLC-ELLC are not likely to be significant; however, mitigation is proposed to address the qualitative and quantitative unknowns by monitoring for changes. If notable changes occur, the loss of vegetation will be mitigated.
CCRWQCB	CCRWQCB-12	YES	The DEIR does not provide a detailed assessment of these impacts and proposed to identify these impacts after the fact by monitoring the Project's effects on vegetation and wetland habitat in WLLC-ELLC. At a minimum the FEIR must identify and describe the mitigation that will be implemented for the various potential impacts that can be anticipated.	See Comment CCRWQCB-11 about detailed assessment. Impacts to trees are addressed in Mitigation Measure BOT-1d T, which is revised in the FEIR to provide additional detail. The wetland acreages (.05 acre) has been included in the wetland compensation; however, based on the analysis of potential changes, trees and wetlands should persist because of local drainage.

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CCRWQCB	CCRWQCB-13	YES	The DEIR does not provide any scientific basis for the adequacy of a 5-year monitoring program for the WLLC-ELLC.	Mitigation Measure BOT-1d T has been clarified that vegetation monitoring will occur in Years 3, 6, and 10 after West/East Little Llagas is cut off from upstream flows, and that compensatory mitigation will be required at any time during the monitoring period if changes are detected from altered hydrology. Changes to habitat would take some time to occur, starting about 3 years following the opening of the Reach 7A diversion. Any changes, should they occur, should be apparent within 10 years.
CCRWQCB	CCRWQCB-14	NO	The Project's impacts are extensive including impacts to 24.9 acres of native and non-native riparian forest, 13.03 acres of native and not-native riparian scrub, 4.77 acres of perennial marsh, 28.52 acres of streambed channels and 124.73 acres of upland herbaceous (some of which may be waters of the State, depending on the DEIR's definition of "upland").	SCVWD understands the Project has extensive impacts, and they will be mitigated. The existing condition of the creek includes unstable bed and banks and no natural regeneration of riparian vegetation. Without this Project, the current trend of degradation would continue including proliferation of invasive plant species, which continue to homogenize the corridor, legacy trash and debris on stream banks, opportunistic armoring of stream banks with concrete rubble, illegal road crossings through the creek, and unauthorized use of herbicides and vegetation clearing. Purchasing of private land converting it to public ownership should alleviate a lot of the deleterious activities, which has contributed to the current conditions on the valley floor. Mitigation Measure BOT-1c T commits the SCVWD to a revegetation plan, which will offset all impacts associated with the Project and will include elements such as trash removal, invasive species removal, and planting on infill areas with native vegetation, which in addition to the stable channel design will result in improved water quality and habitat in the Project area and ultimately the watershed downstream, and better support beneficial uses.  None of the areas identified as upland are waters of the State.
CCRWQCB	CCRWQCB-15	NO	The impacts to WLLC-ELLC are still unknown. Therefore it is premature to assert that the impact will be less than significant, or that mitigation measures included in the DEIR are adequate to mitigate them to less than significant levels.	The CEQA document is required to use best available data. The analysis is based on a number of technical memos prepared by SCVWD, which are referenced in the EIR and are available upon request. The EIR concludes that impacts to habitat and beneficial uses in WLLC-ELLC are not likely to be significant; however, mitigation is proposed to address the qualitative and quantitative unknowns by monitoring for changes. If notable changes occur, the loss of vegetation

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
				will be mitigated. The 0.05 acre of wetland identified in the area of WLLC-ELLC have been included in the wetland mitigation acres; although, the analysis suggests that these wetlands will persist post-Project and impacts would be less than significant.
CCRWQCB	CCRWQCB-16	YES	Mitigation Measure BOT-1c T does not include enough detail for Central Coast Water Board staff to determine that the revegetation monitoring and mitigation plan will mitigate Project impacts to less than significant level.	Mitigation Measure BOT-1c T has been revised to include more detail about the objectives of the revegetation plan. As indicated in the H.T. Harvey & Associates June 2013 Revegetation Acreage and Planting Polygon Refinement Technical Memorandum, the total surface area of PFO, PSS, and Upland Herbaceous (U/H) polygons throughout the Project area is approximately 48.3 acres, 23.1 acres, and 57.4 acres, respectively. The total length of PFO and PSS polygons is approximately 31,537 linear feet, 39,728 linear feet, and 57.4 linear feet, respectively; these values do not include offsite mitigation areas. The Revegetation Plan will be completed after the final design is available. This document will be a key document to obtaining several permits for the Project including the 401 Certification from the CCRWQCB.
CCRWQCB	CCRWQCB-17	NO	The CCWB staff has stated in previous comments that the revegetation plan should be limited by hydraulic concerns a little as possible. Based on Figures 3.13-1f and g, it is unclear that the revegetation Plan will optimize vegetation on the basis of site conditions.	The visual simulations were completed to address aesthetics and not the revegetation plan. They were completed at an early phase of the analysis before the 65-percent design was complete. Woody vegetation is present in the mentioned figures to a greater extent than in the existing conditions. The existing soil conditions in Reaches 4, 5, and 6 are nutrient deficient and likely would not support an increase in plant density over what is proposed in the Revegetation Plan.
CCRWQCB	CCRWQCB-18	NO	The FEIR should clearly state and consistently represent all objectives of the mitigation plan, particularly those that have been discussed with regulatory agencies.	The overall objective of the Revegetation Plan is to improve and enlarge the higher quality habitat, which creates a continuous corridor for wildlife movement both upstream and downstream of the Project limits. The mitigation plan is under development and will be based on the final design. However, it will contain the objectives discussed with the regulatory agencies.



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CCRWQCB	CCRWQCB-18	YES	Mitigation Measure BOT-1e T proposes to provide mitigation for the loss of mature trees in WLLC-ELLC. The DEIR is silent on mitigation for other losses in WLLC-ELLC.	A wetland delineation was conducted in the WLLC-ELLC area. The wetland impacts for this area are discussed on Page 3.4-39. The identified acreage is being compensated in the Lake Silveira mitigation element; however, impacts are not anticipated to wetlands in the cutoff portion of WLLC-ELLC. The Mitigation BOT-1d T has been revised to include replacement ratios and locations for more than just mature trees. The SCVWD completed a baseline biotic evaluation for the portion of the stream, which will experience a reduction in the magnitude of high flows and the quality and quantity of habitat is extremely low due to excessive prolonged disturbance. It is unclear from the comment "what other losses" besides wetland and riparian there would be given existing conditions.
CCRWQCB	CCRWQCB-19	YES	Since the District will revegetate Project channels in a manner that optimizes/maximizes onsite soil and moisture conditions, and the failure of trees in WLLC-ELLC suggests that the area would not support additional trees, adequate location for replacement trees may not be available. The FEIR must demonstrate that all proposed mitigation is achievable.	Based on the analysis by the SCVWD, existing WLLC-ELLC currently overbanks due to its very limited hydraulic capacity. With local drainage still present, changes to the WLLC-ELLC hydrology is anticipated to be minor with no loss of existing mature trees resulting from the Project. However, if losses occur to existing mature trees because of the changed hydrology in WLLC-ELLC after construction of the Project, SCVWD staff will first investigate onsite-in-kind opportunities utilizing SCVWD and/or other public owned lands. If replanting is not deemed feasible (i.e., soils and hydrology) for onsite planting locations within the watershed, then an out-of-kind strategy (i.e., Lake Silveira) will be developed by SCVWD staff at a higher mitigation ratio, subject to approval by the Resource agencies.
CCRWQCB	CCRWQCB-20	NO	The DEIR states that the mitigation plan will compensate for impact to California sycamore woodland (MM BOT-1c T). However the DEIR also states that impacts to California sycamore woodland would remain significant after implementation of mitigation (p3.4-37). These statements are contradictory and make it unclear that impacts to California sycamore will be adequately mitigated.	Although the California sycamores removed by the Project will be replaced, they are rarer statewide than the other trees being removed and the replacement potential is limited due to changed hydrology in the watershed. So while sycamores will be replanted wherever they can survive based on available soils and hydrology, it is unlikely that there are enough planting areas to meet the mitigation ratios typically required for sycamores. The exact number of trees to be removed by the Project and replaced in the Revegetation Plan will not be known until the final design is complete.

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CCRWQCB	CCRWQCB-21	YES	The commitment the District has expressed that the revegetation plan will optimize vegetation for site soil and moisture conditions is not included in the description of Mitigation Measure BOT-1c T. Since it is an essential element it should be clearly stated in the FEIR.	Mitigation Measures BOT-1c T is revised to include more detail about the major elements of the Revegetation Plan that will be based on the final design. It will be a key document to obtaining several permits for the Project including the 401 Certification from the CCRWQCB.
CCRWQCB	CCRWQCB-22	NO	The DEIR states that the revegetation, monitoring, and mitigation plan developed in accordance with Mitigation Measure BOT-1c T will be consistent with the USFWS draft Coordination Act Report. However the CCWB staff has provided comments previously that the mitigation strategy outlined in the CAR may not be adequate to satisfy CCWB requirements.	The CAR was used as a guiding document for mitigation recommendations other than simply revegetation (i.e., instream complexity, low flow channel for fish passage, compensatory mitigation-Lake Silveira). However, the CAR will not be the exclusive basis for the revegetation strategy. The CCRWQCB has commented that the mitigation ratios are inadequate, which the SCVWD has acknowledged and responded that the CAR mitigation ratios did not dictate the revegetation strategy. Since the over-arching goal of the CAR is to improve wildlife functions in the Project reaches, the SCVWD believes that this goal will be accomplished with the proposed mitigation and, therefore, be consistent with the CAR.
CCRWQCB	CCRWQCB-23	YES	It is unclear that the impact analysis in the CAR covers all waters of the State or full identifies and evaluates all impact to water quality and beneficial uses of waters of the State.	The FEIR has been updated to indicate that waters of the State values are included in the CDFW jurisdiction numbers and that waters of the State have been accounted for in the impact analysis. The specific waters of the State values will be provided in the permit applications based in the final design.
CCRWQCB	CCRWQCB-24	NO	The mitigation ratios in the CAR may not be adequate to fully replace lost habitat functions and beneficial uses.	The CAR was used as a guiding document for mitigation in the early stages of Project development but the mitigation ratios did not dictate the revegetation strategy. The intent of the mitigation strategy is to maximize the vegetation given the soil and hydrologic conditions; so while the ratios are referenced they do not dictate what is planned for improvement to the habitat post construction. The Mitigation and Monitoring Plan to be submitted as part of permit applications will not use the CAR ratios.

**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CCRWQCB	CCRWQCB-25	NO	The Upper Llagas Creek 65% Design Habitat Impact Analysis Technical Memorandum prepared by HT Harvey and Associates includes a statement that the riparian scrub-shrub designation includes species that are in early developmental stages of habitat designated as riparian forest. CCWB staff infers from this statement that early stages of riparian forest might be mitigated with riparian scrub-shrub. This approach could result in loss of habitat functions and beneficial uses and therefore would not provide adequate mitigation.	The PSS designation, which is cited in the 65-percent design Impact Analysis, does come from the CAR and refers to "woody plant growth averaging 20 feet or less in height along the stream corridor. Scrub-shrub along the stream is generally an early succession stage of riparian forest". The Forest habitat type has higher species diversity even though it includes the same shrub species as the scrub palette but it also includes a variety of riparian tree species. The goal of the mitigation strategy is to improve the vertical and horizontal complexity of the riparian corridor and to maximize the succession potential by selecting a plant palette that is suited for the soil and hydrology conditions within the watershed. The intent is not to replace trees with scrubs.
CCRWQCB	CCRWQCB-26	NO	The FEIR should include a qualitative and quantitative analysis of all impact to waters of the State and demonstration that the proposed mitigation strategy and mitigation ratios will mitigate all impact to waters of the State and their beneficial uses to less than significant levels.	The CDFW jurisdictional boundaries provided in Tables 3.4-4 through 3.4-6 fully cover waters of the State. The EIR provides a complete qualitative and quantitative analysis of impacts associated with the Project. Mitigation Measure BOT-1c T commits the SCVWD to a Revegetation Plan, which will offset all impacts to a less-than-significant level associated with the Project and will include elements, such as trash removal; invasive species removal; and planting on infill areas with native vegetation, which in addition to the stable channel design will result in improved water quality and habitat in the Project area and ultimately the watershed downstream; and better support beneficial uses.
CCRWQCB	CCRWQCB-27	NO	The Geomorphic Assessment and Recommendations for Portions of Llagas Creek Reach 6 from South of San Martin to North of Church Avenue Technical Memorandum prepared by Balance Hydrologic, Inc. includes several recommendations related to Project activities in Reach 6. The DEIR does not appear to address or incorporate these recommendations. The FEIR should address all studies and alternatives which could result in an improved project, and incorporate recommendations that improve the environmental value of the Project.	The recommendations have been included in the design and basis of design of the Proposed Project.



**Table 2-2 Response to Comments**

Commentor	Comment Code	Revise EIR?	Comment	Response
CCRWQCB	CCRWQCB-28	NO	The cumulative impact analysis should include an evaluation of the following cumulative impacts: An assessment of the cumulative effects of stream modification resulting from channelization and flood improvement projects that have occurred over the years; An assessment of encroachments and impacts on riparian areas associated with the listed projects; An assessment of cumulative water quality effects due to land use changes with the Llagas Creek watershed associated with the listed projects.	<p>Modifications to the Llagas Creek watershed, including agriculture, urban development, and Chesbro Dam, have been ongoing since the 1800s and the effects have contributed to degraded baseline conditions. The EIR notes throughout that the Llagas Creek channel is incising with unstable bed and banks and no natural regeneration of riparian vegetation; invasive plant species have proliferated; and the banks contain legacy trash and debris. This has had an adverse impact on water quality and beneficial uses of Llagas Creek. The EIR analyzes where the Proposed Project may have a cumulative effect with other closely related past, present, and reasonably foreseeable probable future projects. Where the incremental impacts of the Proposed Project combined with other projects become environmentally significant, mitigation has been proposed.</p> <p>It is not practicable to discuss all past actions as part of the cumulative impact analysis. Past actions of recent projects in the immediate area were included because the impacts occurred recently and such recent changes are more likely to result in a noticeable change in combination with the Project alternatives than actions that occurred in the more distant past. Riparian habitat and water quality impacts were included in the Cumulative Impact Analysis in Sections 4.1.3.2 and 4.1.3.4.</p>

This Page Intentionally Left Blank

## 3 Mitigation Monitoring and Reporting Program

---

### 3.1 Introduction

The California Environmental Quality Act (CEQA) requires the adoption of feasible mitigation measures to reduce the severity and magnitude of potentially significant environmental impacts associated with project development. The FEIR for the Project includes mitigation measures to reduce the potential environmental effects of the Proposed Project.

Monitoring of the implementation of adopted mitigation measure is required by Public Resources Code Section 21081.6. The FEIR for the Project provides a list of Project-specific mitigation measures and describes the process whereby the mitigation measures would be monitored. Following certification of the FEIR and approval of this Mitigation Monitoring and Reporting Program (MMRP) by SCVWD, the mitigation measure included in the FEIR would be monitoring in the manner specified by the MMRP.

### 3.2 Purpose

The purpose of the MMRP is to ensure compliance with all mitigation measures designed to mitigate or avoid potentially significant adverse environmental impacts resulting from the Project, identified in the FEIR. Implementation of the MMRP shall be accomplished by SCVWD. Project-specific mitigation measures will be implemented during the time specified in the MMRP and reports will be generated to document implementation of the mitigation measure. Copies of all reports identified in the MMRP will be submitted to responsible agencies.

### 3.3 Summary Project Description

The Proposed Project would provide flood protection for residents, businesses, and infrastructure within the Upper Llagas Creek watershed. The Project area consists of the upper seven reaches (4, 5, 6, 7A, 7B, 8, and 14) of East Little Llagas Creek, West Little Llagas Creek, and Llagas Creek, from just downstream of Buena Vista Avenue extending upstream to Llagas Road in Morgan Hill. Generally in the area of City of Morgan Hill, community of San Martin, and sphere of influence of the City of Gilroy. The objectives of the Project include: increasing flood protection for up to a 1-percent flood exceedance event (100-year flood) in the City of Morgan Hill; assuring no additional flooding is induced on Llagas Creek by the upstream improvements along the reaches downstream from Morgan Hill; and providing a 10-percent flood exceedance capacity (10-year flood) on East Little Llagas Creek.

Upper Llagas Creek has flooded the San Martin and Morgan Hill communities repeatedly, as documented between 1937 and 2009. This flooding has caused damage to private and public property, resulting in economic losses in the inundated urban areas. The Proposed Project is needed to manage flood risk within the Upper Llagas Creek watershed. Table 3-1 provides a general summary of the features of the Proposed Project.



**Table 3-1 Overview of Proposed Project Components**

Proposed Project Component	Description
Channel Widening and Deepening	Channels would have a cross section with a sinuous low-flow channel, a widened and deepened bankfull channel typically with inset geomorphic benches, and engineered banks that are generally 3H:1V slope. Depth would be increased by about 4 to 5 feet and widths increased about 30 to 60 feet wider than the existing channel. Channel widening would be limited to one bank, where possible, to avoid and preserve existing stands of mature vegetation.
Tunnel	The construction of a 2,100-foot-long tunnel near Warren Avenue, extending under Nob Hill.
Maintenance Road Modifications	Maintenance roads would be developed along both banks of the channel. The roads would be about 18 feet wide and comprised of an aggregate base.
Culvert Modifications	Culverts will be modified, reconstructed or added at several roadway crossings to increase stream flow capacity and reduce historic culvert backwatering.
Habitat Enhancements	Clusters of log-root wad structures and stream boulder clusters would be installed to provide cover and rearing for fish in Reaches 4, 5, 6, and 7A. Lake Silveira would be partially filled to create new wetlands and aquatic habitat. Streamflow would be restored to the abandoned historic Llagas Creek channel around the north side of the lake, providing enhanced fish habitat.
Other Modifications	Construction of a 1.25-mile diversion channel on West Little Llagas Creek extending to Llagas Creek just downstream from Lake Silveira, exhume two buried bridges at Watsonville Road and West Middle Avenue, and install grade control structures in the streambed made from natural boulders.
Property Acquisitions	Temporary construction or permanent easements will be obtained from several parcels along Upper Llagas Creek.
Relocation/Replacement of Utilities and Structures	Some homes and other types of structures within the Project's Right-of-Way will need to be relocated or replaced, and the same for utilities within the Project construction footprint.

### 3.4 Responsibilities and Duties

SCVWD will be responsible for ensuring that mitigation measures are implemented prior to, during, and after construction of the Project. As the Project Applicant, they will be responsible for mitigation measures implementation, unless otherwise noted in the MMRP table (Table 3-2). In general, monitoring will consist of demonstrating that mitigation measures were implemented, and that responsible entities monitored the implementation of the measures. SCVWD is also responsible for ensuring that copies of all reports identified in the MMRP are sent to the responsible agencies.

### 3.5 Mitigation Monitoring and Reporting Plan Matrix

All Project-specific mitigation measures included in the Summary of the FEIR (Table S-1) would be monitored in conjunction with the MMRP and Project. The following MMRP matrix includes all the applicable mitigation and monitoring information for the Project.

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
<b>Geology and Soils</b>					
Inspect Project culverts, maintenance roads, and channels after a major earthquake.	GEO-1a	Following any earthquake of Magnitude 4.9 or greater, SCVWD will inspect Project culverts, maintenance roads, and channel for any failures that require repair or remediation as well as implement necessary repairs.	Operations and Maintenance	SCVWD	SCVWD
Inspect tunnel displacement bands after an earthquake.	GEO-1b	Following any earthquake of Magnitude 3.7 or greater, SCVWD will inspect tunnel displacement bands for any structural instability as well as implement necessary repairs.	Operations and Maintenance	SCVWD	SCVWD
<b>Mineral Resources</b>					
Stop construction if poppy jasper is discovered.	MIN-2	If the contractor discovers poppy jasper, construction will be immediately stopped within 50 feet of the deposit and a qualified geologist will be brought in to determine the significance of the discovery. The contractor will notify the property owner of the discovery and the property owner will be the legal owner of the deposit.	Construction	Contractor	SCVWD
<b>Botanical Resources</b>					
Conduct special-status plant species surveys.	BOT-1a	SCVWD will conduct surveys to determine the presence of four special-status plant species that may be present within the Project footprint including big-scale balsamroot, Loma Prieta hoita, fragrant fritillary, and arcuate bush-mallow. The surveys will be conducted during the appropriate season for each species, following the CNPS, CDFW, and USFWS guidelines, and occur before construction begins. Any sensitive communities observed during the surveys will be mapped.	Pre-Construction	SCVWD	SCVWD
Prepare a mitigation plan if special-status plant species are found.	BOT-1b	SCVWD will initiate consultation with the USFWS or CDFW to finalize a mitigation plan if any special-status plant species are found during the surveys described in BOT-1a. If required, the mitigation plan will: <ul style="list-style-type: none"> <li>&gt; Be prepared by a qualified botanist with experience in native plant restoration, mitigation, and management.</li> <li>&gt; Describe avoidance measures to be taken before and during construction (such as construction setbacks, exclusionary fencing, and pre-construction training) that would avoid special-status impacts.</li> </ul>	Pre-Construction (mitigation plan), Operations and Maintenance (Maintenance and Monitoring Plan)	SCVWD	USFWS, CDFW

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		<ul style="list-style-type: none"> <li>&gt; Describe compensatory mitigation (including preservation or creation) if impacts to special-status species are unavoidable. In particular: <ul style="list-style-type: none"> <li>– A new population will be created using propagules collected from the impact site or the existing population will be preserved at a ratio of 2 acres preserved for every 1 acre removed (as determined by USFWS or CDFW during consultation).</li> <li>– Clearly defined performance criteria for plant establishment and non-native species control measures will be included along with the locations and specific procedures needed for restoration.</li> <li>– Plant salvage will not be conducted in lieu of population creation using local propagules or population preservation.</li> <li>– A minimum 5-year post-construction maintenance and monitoring plan for plant salvage or population creation will be specified that includes remedial action measures.</li> <li>– Annual reports and a final report documenting the success of the mitigation will be submitted to USFWS or CDFW.</li> <li>– A funding source will be secured to pay for the mitigation and monitoring operations.</li> </ul> </li> <li>&gt; Describe mitigation bank credits that can be purchased as an alternative to population creation and population preservation if impacts to special-status species are unavoidable. Credits would be purchased at a ratio of 2 to 1 at a local site or in southern Santa Clara Valley (if a local option is unavailable).</li> </ul>			
Prepare a Revegetation, Monitoring, and Mitigation Plan for impacts to wetlands, riparian woodland, riparian scrub-shrub, and California sycamore woodland.	BOT-1c	<p>SCVWD will prepare a revegetation, monitoring, and mitigation plan for impacts to wetlands, riparian woodland, riparian scrub-shrub, and California sycamore woodland. The plan shall:</p> <ul style="list-style-type: none"> <li>&gt; Be consistent with the Draft Fish and Wildlife CAR.</li> <li>&gt; Specify mitigation requirements for western sycamore including performance criteria standards and goals as well as remedial measures if trees fail.</li> </ul>	Pre-Construction	SCVWD	CDFW, USACE, USFWS, CCRWQCB



**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		<ul style="list-style-type: none"> <li>&gt; Specify a funding source.</li> <li>&gt; Include a detailed implementation schedule.</li> <li>&gt; Limit areas for collection of propagules, especially for western sycamores to ensure a non-hybrid stock.</li> <li>&gt; Specify planning types and densities.</li> <li>&gt; Detail irrigation plans.</li> <li>&gt; Specify weed control procedures.</li> <li>&gt; Define performance criteria for trees and habitat.</li> <li>&gt; Detail reporting requirements.</li> <li>&gt; Contain an adaptive management plan.</li> <li>&gt; Detail restoration of the Lake Silveira site including: <ul style="list-style-type: none"> <li>– Restoration of the historic creek channel (including aggressive non-native blackberry removal and overstory and understory vegetative plantings);</li> <li>– Conversion of Lake Silveira open water habitat to emergent perennial wetland and shallow open water; and</li> <li>– Installation of islands in the open water habitat.</li> <li>– Placement of LWD.</li> </ul> </li> </ul>			
Prepare a monitoring plan for West/East Little Llagas Creek and monitor vegetation changes.	BOT-1d	<p>SCVWD will prepare a plan and monitor changes to vegetation and vegetation communities in West/East Little Llagas Creek resulting from altered hydrology as a result of the Project. Monitoring shall be conducted in Years 3, 6, and 10 following construction. The plan will include:</p> <ul style="list-style-type: none"> <li>&gt; Monitoring timing,</li> <li>&gt; Methods,</li> <li>&gt; Reporting, and</li> <li>&gt; Funding contingencies for the replacement of lost mature trees at a minimum 5:1 ratio loss of riparian habitat would be at a 3:1 ratio, and replacement of wetlands is a 2:1 ratio.</li> </ul>	Pre-Construction (Monitoring Plan), Operations and Maintenance (Monitoring)	SCVWD	CDFW, CCRWQCB, USACE
Dispose of invasive non-native species.	BOT-1e	The contractor will dispose of any invasive non-native species removed during construction to an off-site location and take precautions to prevent the spread and establishment of these species.	Construction, Operations and Maintenance	Contractor	SCVWD

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
<b>Wildlife Resources</b>					
Remove vegetation during avian non-breeding season.	WILD-1a	<p>SCVWD and the Contractor shall take the following actions to limit disruption to avian species:</p> <ul style="list-style-type: none"> <li>&gt; Remove vegetation during the avian non-breeding season (September 1 to February 1) where possible</li> <li>&gt; If vegetation removal occurs during avian breeding season: <ul style="list-style-type: none"> <li>– Conduct a pre-construction nesting bird survey no more than 14 days prior to ground disturbance and no more than 7 days prior to vegetation removal</li> <li>– If active nests are found within the work area: <ul style="list-style-type: none"> <li>▪ A “no disturbance” buffer zone will be established around the nest until a qualified biologist can determine that all young have fledged and are independent of parental care</li> <li>▪ The buffer zone size depends on species, location, and placement of nest (to be determined in consultation with CDFW).</li> </ul> </li> </ul> </li> <li>&gt; Vegetation removal is limited to the minimum amount necessary to achieve Project goals.</li> </ul>	Construction	SCVWD, Contractor	CDFW
Avoid special-status amphibians and reptiles.	WILD-2a	<p>SCVWD and the Contractor shall take the following actions to avoid special-status amphibians and reptiles:</p> <ul style="list-style-type: none"> <li>&gt; Employ a qualified biologist to conduct pre-construction surveys within 48 hours prior to construction for Western Pond Turtle, California Tiger Salamander, and other special-status amphibians and reptiles in reaches with perennial water, standing ponds, anywhere in-water construction is required, adjacent upland habitat (scrub and annual grassland), riparian woodland clearings, and the dispersal range of each species.</li> <li>&gt; SCVWD will consult with CDFW and USFWS if construction would occur within identified California Tiger Salamander habitat and implement any required protection measures.</li> <li>&gt; Protection measures may include: <ul style="list-style-type: none"> <li>– Establishing site-specific exclusion zones to protect breeding habitat</li> </ul> </li> </ul>	Pre-Construction (Survey), Construction (Implement protection measures)	SCVWD, Contractor	CDFW, USFWS

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		<ul style="list-style-type: none"> <li>– Install temporary fencing and “Sensitive Area” signage around exclusion zones</li> <li>– Limit any work done in special-status amphibian and reptile breeding sites to a period of June 1–October 14 or October 15–May 31</li> <li>– Limit night-time off-pavement vehicle and equipment parking, especially during and for 24 hours after rain events.</li> <li>– Check under vehicles parked off pavement overnight before moving them.</li> <li>– From April 1–August 31, in any Western Pond Turtle dispersal habitat, limit use of vehicles and equipment in upland habitat to avoid crushing nests and dispersing females.</li> </ul>			
Monitor for special-status species during dewatering.	WILD-2b	SCVWD’s biological monitor will be present prior to the start of construction until the site is dewatered and completely isolated. The monitor will inspect the work area for wildlife that has become entrapped during dewatering. If special-status species are detected, all construction activities will cease except as directed by the monitor until the species can be captured and relocated following the guidance of the appropriate regulatory agency (i.e., CDFW, USFWS, NMFS).	Construction	SCVWD	CDFW, USFWS, NMFS
Relocate any found special-status amphibians or reptiles.	WILD-2c	SCVWD’s biological monitor (permitted for FESA Section 10(a)(1)(A) or working under another’s permit) will relocate any special-status amphibians and reptiles found in the construction area after coordinating with CDFW or USFWS and developing a plan including capture method, handling procedures, and relocation area.	Construction	SCVWD	CDFW, USFWS
Compensate for any impact to special-status amphibians and reptiles or their habitat.	WILD-2d	<p>For any unavoidable impact to special-status amphibians and reptiles and their habitat, SCVWD will work with the appropriate resource agency to take the following steps:</p> <ul style="list-style-type: none"> <li>&gt; Quantify the impact by determining acres of potentially suitable habitat that were impacted.</li> <li>&gt; Compensate for the protection, enhancement, and/or management of such lands.</li> </ul>	Post-Construction	SCVWD	CDFW, USFWS



**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
Limit nighttime impacts to wildlife.	WILD-2e	<p>The Contractor will implement the following nighttime work measures to limit impacts to wildlife:</p> <ul style="list-style-type: none"> <li>&gt; Limit illumination to the immediate work area.</li> <li>&gt; Shield lights and point them downward.</li> <li>&gt; Use red filters or red vellum over lights attached to equipment.</li> <li>&gt; Use Lower Pressure Sodium 18w, 35w, LED lights with red, orange, or amber diodes (not filters), true red neon, or other light source 560 nm or longer for stationary lights.</li> <li>&gt; Operate off-road equipment at less than 5 mph.</li> <li>&gt; Keep verbal communication to a conversational sound level.</li> </ul>	Construction	Contractor	SCVWD
Train workers in environmental awareness and protective measures.	WILD-2f	<p>SCVWD will conduct environmental awareness training for all Contractor staff working on the Project, which will educate workers about special-status wildlife potentially occurring onsite and provide a brief description of listing status, identification keys, behavior, habitat, sensitivity to human disturbance, take definitions and consequences and Project measures implemented to prevent species take including limiting construction to daylight hours, speed limits, and clean construction practices.</p>	Pre-Construction	SCVWD	SCVWD
Monitor bullfrog population at Lake Silveira.	WILD-2g	<p>SCVWD will perform three sets of day/night bullfrog surveys in the spring or early summer prior to construction at Lake Silveira then repeat three sets of day/night surveys around the same time every year for a minimum of 3 years to verify the bullfrog population does not significantly increase. If it does, SCVWD will consult with the appropriate resource agency to implement necessary control measures (i.e., CDFW and USFWS).</p>	Pre-Construction (First set of surveys), Post-Construction (subsequent annual surveys)	SCVWD	CDFW and USFWS
Monitor for and limit impacts to bats.	WILD-3a	<p>SCVWD and the Contractor will implement the following measures to limit impacts to bats:</p> <ul style="list-style-type: none"> <li>&gt; Remove trees, buildings, and culverts scheduled for replacement from late August through October, whenever possible.</li> <li>&gt; Employ a qualified biologist to conduct a roosting bat survey in any trees or culverts being removed no more</li> </ul>	Construction	SCVWD, Contractor	SCVWD

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		<p>than 7 days before removal.</p> <ul style="list-style-type: none"> <li>&gt; If special-status bats or the presence of bats is detected, the biologist will consult with CDFW to develop a strategy to minimize disturbance to the roosting bats.</li> <li>&gt; If a maternity roost is detected, the biologist will consult with the appropriate resource agency to develop a strategy to protect the roost, such as implementing a non-disturbance buffer around the roost and postponing removal of structures (i.e., tree or culvert) within 250 feet of the maternity roost until it is no longer active.</li> <li>&gt; Avoid occupied roosts.</li> <li>&gt; Implement non-disturbance buffers around hibernacula.</li> <li>&gt; Ensure safe eviction of non-breeding bats if avoidance is not feasible.</li> </ul>			
Install bat boxes to serve as bat roosting habitat.	WILD-3b	SCVWD will consult with CDFW to determine the location and number of bat boxes to install at least 150 feet from a construction zone to compensate for loss of roosting trees.	Construction	SCVWD	CDFW
Monitor for and exclude bats from roosting in the tunnel.	WILD-3c	The Contractor will install bat exclusion measures, such as maintaining airflow through the tunnel, exterior grade plywood over manholes, and braided nylon netting over larger access points during construction. SCVWD will employ a qualified biologist to complete annual inspections of the tunnel prior to annual maintenance. If bats are detected, SCVWD will begin monitoring to determine baseline counts as well as consult with resource agencies, as needed. SCVWD will install one-way 0.25-inch mesh exits to allow bats to leave and not return to the tunnel, as needed.	Construction, Operations and Maintenance	Contractor, SCVWD	SCVWD
Monitor for and minimize impacts to woodrats.	WILD-4	<p>SCVWD will conduct pre-construction surveys for the San Francisco dusky-footed woodrat and its habitat in areas proposed for vegetation removal plus a 10-foot buffer and areas that provide suitable habitat for the species (such as riparian forests along the West Little Llagas Creek, the confluence of Lake Silveira and West Little Llagas Creek, and East Little Llagas Creek) no more than 30 days prior to a period of disturbance.</p> <ul style="list-style-type: none"> <li>&gt; For any woodrat nests found, SCVWD will report their presence to CDFW, flag the location for avoidance, and utilize stakes, flags, or plastic tape to enforce avoidance</li> </ul>	Pre-construction (Surveys), Construction (Avoidance)	SCVWD, Contractor	CDFW

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		<p>by the Contractor.</p> <p>&gt; For any woodrat nests that cannot be avoided SCVWD will work with CDFW to develop a nesting material relocation, enhancement and monitoring plan to minimize impact to this species.</p>			
Monitor for and minimize impacts to host plants of special-status invertebrates.	WILD-5a	SCVWD will employ a qualified biologist/botanist to conduct pre-construction surveys for host plants of special-status invertebrates within the Project area, including <i>Plantago erecta</i> , <i>Platystemon californicus</i> , <i>Castilleja densilifera</i> and <i>C. exerta</i> in annual grassland habitat or other suitable habitat for serpentine associated plants. If native host plants are observed in the area, they will be flagged for avoidance and no vegetation removal will occur within a designated buffer until guidance from the appropriate resource agency has been provided.	Pre-Construction (Surveys), Construction (Avoidance)	SCVWD	SCVWD
Monitor for Serpentine-associated special-status invertebrates.	WILD-5b	SCVWD will consult with USFWS to develop a management and monitoring plan for Serpentine-associated special-status invertebrates that will detail a compensation plan for unavoidable impacts including enhancement, management, or protection of in-kind communities at a ratio determined by USFWS. Serpentine habitat will be mapped prior to construction to allow quantification of the impacts to the Serpentine habitat that require compensatory mitigation.	Pre-Construction (Plan and mapping), Post-Construction (compensatory mitigation)	SCVWD	USFWS
Implement the USFWS Standardized Recommendations for Protection of the San Joaquin Kit Fox.	WILD-6	<p>SCVWD and the Contractor will implement the recommended measures in the USFWS Standardized Recommendations for Protection of the San Joaquin Kit Fox prior to or during ground disturbance including:</p> <p>&gt; Limiting Project-related vehicle traffic to established roads or designated areas onsite, 20 miles per hour speed limit in Project areas without an established speed limit, no off-road traffic outside of the designated Project areas.</p> <p>&gt; All excavated, steep-walled holes or trenches more than 2 feet deep shall be covered at the close of each working day by plywood or similar materials or provided with one or more escape ramps constructed of earth fill or wooden planks. Before such holes or trenches are filled, each shall be thoroughly inspected for trapped animals</p>	Pre-Construction, Construction	SCVWD, Contractor	SCVWD



**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		<p>that should be allowed to escape before proceeding.</p> <ul style="list-style-type: none"> <li>&gt; All construction pipes, culverts, or similar structures with a diameter of 4 inches or greater that are stored open onsite for one or more nights shall be thoroughly inspected for animals before the pipe is subsequently buried, capped, or otherwise used or moved in any way.</li> <li>&gt; All food-related trash items, such as wrappers, cans, bottles, and food scraps, shall be disposed of in closed containers and removed at least once a week from the Project site.</li> <li>&gt; No firearms or pets are permitted on the Project site.</li> </ul> <p>If the kit fox is found onsite, all work within the area will cease until a qualified biologist is notified and can provide avoidance measures and assist in implementing recommendations for the appropriate regulatory agency.</p>			
<b>Aquatic Resources</b>					
Design for steelhead passage through the Project area.	AQUA-1a	SCVWD will incorporate criteria from Anadromous Salmonid Passage Facility Design (NMFS 2008) into the final channel design including using site-specific information regarding hydrology, river morphology, and the life stage, run size, and migration period to maximize the ability of steelhead to pass through the Project area.	Pre-Construction	SCVWD	NMFS
Inspect large woody debris for erosion hazard and ecological importance before removal.	AQUA-1b	<p>SCVWD and the Contractor will implement the following measures to limit the impact to migrating adult salmonids:</p> <ul style="list-style-type: none"> <li>&gt; Coordinate with a qualified biologist to determine a reference size of in-stream LWD that could potentially serve as a hydraulic refuge for salmonids migrating upstream.</li> <li>&gt; Any LWD above the reference size will be inspected to determine: <ul style="list-style-type: none"> <li>– If it is ecologically important to the channel, and</li> <li>– If it poses an erosion hazard.</li> </ul> </li> <li>&gt; If it poses no erosion hazard, but is ecologically important, it will not be removed.</li> <li>&gt; If it poses an erosion hazard but is ecologically important, it will be modified to prevent debris capture, bank scour, or aggradation or it will be moved to a</li> </ul>	Construction	SCVWD, Contractor	SCVWD

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		nearby stream where it reduces flood hazard and maintains ecological function.			
Monitor for spawning steelhead during dewatering activities.	AQUA-2	SCVWD will keep a biological monitor onsite during isolation and dewatering activities to inspect for steelhead. If steelhead are found during construction activities, work will stop until the steelhead have been relocated.	Construction	SCVWD	SCVWD
<b>Agricultural and Forest Resources</b>					
Treat agricultural soil after construction.	AG-1a	At the end of construction, SCVWD will rip and disk the ground of any agricultural areas temporarily converted during construction to reduce soil compaction and benefit texture and tilth. SCVWD shall consult the landowner to determine necessary depth of sub-soiling.	Post- Construction	SCVWD	SCVWD
Compensate for Prime Farmland, Unique Farmland or Farmland of Statewide Importance that is permanently converted.	AG-1b	<p>SCVWD shall take one of the following actions to compensate for each acre of Prime Farmland, Unique Farmland, or Farmland of Statewide Importance that is permanently converted as a result of the Project:</p> <ul style="list-style-type: none"> <li>&gt; Contribute current market value at a 1:1 ratio for each acre of farmland to a fund that protects agricultural land. (A suitable fund can be located by coordinating with Santa Clara County Open Space Authority, Santa Clara County Farm Bureau, cities in Santa Clara County, the County, or other local governmental agencies.)</li> <li>&gt; Acquire Farmland of Statewide Importance within the County at a 1:1 ratio.</li> </ul> <p>If no Farmland of Statewide Importance is available within the County, SCVWD shall work with one of the aforementioned entities to develop an alternative compensation, such as contributing to a local or regional land conservation banking program or purchasing off-site conservation easements at the same 1:1 ratio.</p>	Post-Construction	SCVWD	SCVWD
Compensate for Williamson Act Land that is permanently converted.	AG-2	<p>SCVWD shall take one of the following actions (in coordination with AG-1b) to compensate for each acre of Williamson Act Land that is permanently converted as a result of the Project:</p> <ul style="list-style-type: none"> <li>&gt; Contribute current market value at a 1:1 ratio for each acre of farmland to a fund that protects agricultural land. (See AG-1b for a list of entities that can coordinate to</li> </ul>	Post-Construction	SCVWD	SCVWD

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		locate a suitable fund.) > Acquire land within the County eligible for Williamson Act classification at the same 1:1 ratio.			
<b>Cultural Resources</b>					
Mark the location of and monitor construction near known cultural resources.	CU-2	SCVWD shall employ a qualified archeologist to mark the site boundaries of known cultural resources within each construction footprint prior to construction beginning. The contract will instruct the construction crew to avoid these resources. The archeologist will be on-call during the construction phase and will be on site any time construction activities would occur within 100 feet of a known cultural resource. The archeologist shall have the authority to stop work prior to Project activities impacting a known cultural resource.	Pre-Construction (mark boundaries of known cultural resources), Construction (monitor construction activities near known cultural resources)	SCVWD, Contractor	SCVWD
<b>Traffic and Circulation</b>					
Maintain vehicle and pedestrian access to driveways, houses, buildings and businesses during Project construction.	TRAFFIC-1	SCVWD shall provide for the following access during construction: > Vehicle and pedestrian access to driveways, houses, buildings, and businesses shall be in operational condition. > Temporary access put in place before regular access is limited by construction in a driveway area. > Any access temporarily rerouted during construction will be restored to equal or better than existing condition before being used again.	Construction	SCVWD, Contractor	SCVWD
Limit interference with local business parking.	TRAFFIC-5	SCVWD and the Contractor shall take the following steps to limit interference with local business parking during construction of the Project: > Develop a circulation and parking mitigation plan that will specify local resident and business parking areas that could be affected by construction. > Coordinate with businesses within the Project footprint, including staging areas, to ensure sufficient parking is maintained. > Temporarily restripe parking area and/or circulation drive aisle to provide for extra parking, if needed. > Limit construction vehicles, equipment staging, and	Pre-Construction (circulation and parking mitigation plan), Construction	SCVWD, Contractor	SCVWD



**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		storage to the immediate construction area to minimize interference with parking.			
Utilize local roads as haul routes.	TRAFFIC-6	<p>Prior to construction, SCVWD will coordinate with Santa Clara County and the City of Morgan Hill to utilize local roads as haul routes during Project construction and will implement the following measures to maintain road condition:</p> <ul style="list-style-type: none"> <li>&gt; Document existing condition of any road that will be used as a haul road.</li> <li>&gt; Repair any Project-related damage to local roads after construction and return roads to pre-construction condition.</li> <li>&gt; Consult with the City and County to identify and complete necessary temporary repairs if local roads are damaged prior to Project completion.</li> </ul>	Pre-Construction (Coordinate and document), Construction, Post-Construction (Road Repairs)	SCVWD	Santa Clara County, City of Morgan Hill
<b>Air Quality and Greenhouse Gases</b>					
Minimize construction related exhaust emissions.	AQ-2	<p>The contractor shall implement the following measures to minimize construction related exhaust emissions:</p> <ul style="list-style-type: none"> <li>&gt; Shut off diesel powered construction equipment when not in use.</li> <li>&gt; Limit diesel powered construction equipment idle time to 2 minutes.</li> <li>&gt; Post clear signs regarding shut off and idle time of diesel powered construction equipment at all access points.</li> <li>&gt; Maintain and properly tune in accordance with manufacturer's specifications all construction equipment.</li> <li>&gt; Check all construction equipment prior to use to verify the equipment is in proper running conditions.</li> <li>&gt; Verify all diesel powered construction equipment is in compliance with the In-Use Of-Road Diesel-Fueled Fleets Rule.</li> <li>&gt; Verify all portable equipment is in compliance with the Portable Equipment Registration Program as effective and applicable any time it is in use.</li> </ul>	Construction	Contractor	BAAQMD

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
<b>Noise</b>					
Utilize noise-reducing enclosures around stationary equipment.	NOI-1a	The Contractor will utilize noise-reducing enclosures around stationary noise-generating equipment (>6 db) or utilize existing barrier features (i.e., stockpiles) to block noise transmission, where possible.	Construction	Contractor	SCVWD
Prepare a noise and vibration control plan.	NOI-1b	For all non-tunnel construction activities, SCVWD and the Contractor will prepare a noise and vibration control plan that will allow construction to comply with all applicable noise performance standards.	Pre-Construction	SCVWD, Contractor	SCVWD
Notify residents of construction and noise complaint procedures.	NOI-1c	Prior to construction, SCVWD shall notify residents within 1,500 feet of construction activities by mail of the proposed start date and contact information for reporting noise complaints as well as designate a Project liaison to respond to noise complaints during construction.	Pre-Construction (notification), Construction (respond to complaints)	SCVWD	SCVWD
Limit the impact of blasting vibrations.	NOI-2a	<p>SCVWD and the Contractor will implement the following measures to minimize the impact of vibrations from blasting activities:</p> <ul style="list-style-type: none"> <li>&gt; As measured at the nearest residence, structure, or location of comparable slant distance, limit ground surface vibration to 0.5 in/sec PPV.</li> <li>&gt; Monitor the vibration at several distances to verify the propagation curve and estimate the vibration at the nearest residence.</li> <li>&gt; Perform tests (such as small test blasts in sealed borings) prior to controlled detonation to determine the vibration dampening properties of the rock.</li> <li>&gt; Limit blast overpressure to 0.0145 psi or 134 dB at the nearest residence.</li> <li>&gt; Notify residents at the portals within 500 feet of near surface detonations and residents away from the portals within 500 feet slant distance of underground detonations about the construction activity schedule.</li> </ul>	Pre-Construction (notification and testing), Construction	SCVWD, Contractor	SCVWD

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
Provide for alternate sleeping accommodations.	NOI-2b	SCVWD shall offer to provide alternative sleeping accommodations to residents that would be impacted by nighttime tunnel excavation activities that exceeded nighttime disturbance criteria on nights when no other mitigations are feasible.	Construction	SCVWD	SCVWD
Notify residents of impacts from pile driver or vibratory compactor vibrations.	NOI-2c	SCVWD will notify residents within 25 feet of an access road or 200 feet of any construction from nonvibratory pile driving or vibratory compactor activities of the following: <ul style="list-style-type: none"> <li>&gt; Their potential for perceiving vibrations.</li> <li>&gt; The potential for vibrations to knock objects off walls/shelves.</li> <li>&gt; Recommendation to move fragile/precious items off of walls/shelves during the pile driver or vibratory compactor operating time period.</li> </ul>	Construction	SCVWD	SCVWD
Limit use of vibratory pile drivers within 200 feet of residential structures.	NOI-2d	The Contractor will not use vibratory pile drivers within 200 feet of residential structures.	Construction	Contractor	SCVWD
<b>Utilities and Public Services</b>					
Repair or replace any well damaged during construction.	UPS-1	For each well damaged during construction, SCVWD will take one of the following actions (prior to service disruption, if possible): <ul style="list-style-type: none"> <li>&gt; Make a new well operable.</li> <li>&gt; Provide a reliable source of water to the current well owner or operator.</li> </ul>	Construction	SCVWD	SCVWD
Develop an emergency response plan.	UPS-3	Prior to construction, SCVWD will work with local police, sheriff, and fire protection services to develop an Emergency Response Plan that will include: <ul style="list-style-type: none"> <li>&gt; A map of all underground and above ground utilities.</li> <li>&gt; A response plan for potential damage to infrastructure including other close proximity utilities at risk.</li> <li>&gt; A detailed construction schedule with locations of construction and alternative routes identified for emergency responders (which will be updated if construction schedules change, especially on arterial or collector roads used by emergency responders).</li> </ul> SCVWD and emergency responders will work together to	Pre-Construction	SCVWD	SCVWD



**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		determine if any Project road closures would have an effect on emergency response times.			
<b>Recreation Resources</b>					
Alter the route of the West Little Llagas Creek Trail.	REC-1a	SCVWD will coordinate with the City of Morgan Hill to develop an alternative route for the trail through sidewalks and city streets, marked with signs to delineate the new route and notice will be posted 30 days in advance of detour.	Pre-Construction	SCVWD	SCVWD
Limit impacts to nearby recreation facilities.	REC-1b	<p>SCVWD will take the following steps to limit impacts to recreation lands and facilities within and close to the Project footprint:</p> <ul style="list-style-type: none"> <li>&gt; Avoid construction activities on public recreation facilities, where possible.</li> <li>&gt; Make every effort to minimize the amount of time public recreation facilities not on SCVWD land are completed closed or time closure for off-peak use times.</li> <li>&gt; If complete closure of non-SCVWD recreation facilities or associated parking is unavoidable, develop a temporary recreation or parking facility, where possible.</li> <li>&gt; Return any impacted facilities not on SCVWD lands to equal or better condition after construction.</li> <li>&gt; Arrange for temporary alternative parking if recreation parking is temporarily impacted.</li> </ul>	Pre-Construction, Construction	SCVWD	SCVWD
Notify the public about any recreation changes as a result of the Project.	REC-1c	SCVWD will develop an outreach plan to inform the public of any recreation closures or limitations in access that occur as a result of the Project in advance of the closure/access change. At a minimum, the outreach will consist of posting flyers/informational boards at parks and other public spaces, as well as utilizing pertinent websites or newspapers informing residents of the purpose of the construction, the length of expected closure/access change, and other similar recreational opportunities in the area that may serve as alternative recreation facilities and notice will be posted 30 days in advance of closure/access changes.	Pre-Construction, Construction	SCVWD	SCVWD

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
<b>Hazards and Hazardous Materials</b>					
Implement good housekeeping measures.	HAZ-2a	<p>The Contractor will implement the following work site housekeeping measures:</p> <ul style="list-style-type: none"> <li>&gt; Keep the work site, adjacent areas, and access roads in an orderly condition, free and clear from debris and discarded materials.</li> <li>&gt; Never sweep, grade, or flush surplus materials, rubbish, debris, or dust into storm drains or waterways.</li> <li>&gt; Remove all building materials, debris, unused materials, concrete forms, and other construction-related materials from the work site upon completion of work.</li> <li>&gt; Drain standing surface water after a maximum of 4 days (96 hours).</li> <li>&gt; Dispose of unwanted or unused artificial containers and tires after use.</li> <li>&gt; Cover, invert, or drill drainage holes in any outdoor objects that can hold standing water.</li> </ul>	Construction	Contractor	SCVWD
Develop a Soil and Groundwater Management Plan.	HAZ-2b	<p>Prior to construction, SCVWD shall employ a State registered hazardous waste investigation and remediation professional to draft a Soil and Groundwater Management Plan that will be onsite during construction and detail the following:</p> <ul style="list-style-type: none"> <li>&gt; Health and safety plan.</li> <li>&gt; Emergency notification protocols.</li> <li>&gt; OSHA and Santa Clara County Hazardous Materials Compliance Division compliant handling and sampling procedures for site workers.</li> <li>&gt; Protocols for offsite disposal of contaminated soils or groundwater.</li> <li>&gt; Coordination and notification protocols and requirements for any inadvertent releases of hazardous materials within the vicinity of any school.</li> </ul>	Pre-Construction	SCVWD	SCVWD
Check for unremediated sites near Project construction and maintenance.	HAZ-2c	<p>SCVWD will use the State Water Resource Control Board's GeoTracker website to search for any "open" sites where contamination has not been remediated within 1,500 feet of any proposed ground disturbing activity (construction or maintenance activities). If "open" sites are found, SCVWD</p>	Pre-Construction	SCVWD	SCVWD

**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
		will contact the listed RWQCB case manager to verify Project activities would not affect site cleanup or monitoring or pose a threat to the public or environment.			
Conduct Phase II site investigations and remove hazardous materials according to local, state, and federal laws and regulations.	HAZ-2d	SCVWD will: <ul style="list-style-type: none"> <li>&gt; Conduct a Phase II hazardous materials investigation consistent with all applicable federal, state, and local codes and regulations for any applicable site prior to groundbreaking.</li> <li>&gt; Implement recommended site remediation and coordination.</li> <li>&gt; Ensure that any hazardous materials removed during construction is handled and disposed of by a licensed waste-disposal contractor and transported by a licensed hauler to an appropriately licensed and permitted disposal or recycling facility.</li> </ul>	Pre-Construction	SCVWD	SCVWD
Limit soil disturbance.	HAZ-2e	The Contractor will ensure that soil disturbance is limited to only what is necessary to complete the construction or maintenance activity.	Construction	Contractor	SCVWD
Stop work if unknown hazardous materials are found.	HAZ-2f	If an unknown hazardous material is found during construction, the Contractor will stop work until SCVWD completes a Phase II hazardous materials investigation (and concurrent Phase I, if needed); identifies the nature and extent of contamination; evaluates the potential impact on Project construction and human health; completes a Phase III evaluation, if needed; and completes any required remediation. SCVWD will also ensure that any hazardous materials removed during construction is handled and disposed of by a licensed waste-disposal contractor and transported by a licensed hauler to an appropriately licensed and permitted disposal or recycling facility.	Construction	SCVWD, Contractor	SCVWD
Survey for asbestos and lead-based paint prior to demolishing or relocating any buildings.	HAZ-2g	Prior to demolishing or relocating any buildings, SCVWD will conduct asbestos and lead-based paint surveys and verify surrounding soils are free of paint chips. If asbestos is found, SCVWD will dispose of it using the methods described in BMP HM-12 (Assure Proper Hazardous Materials Management).	Pre-Construction	SCVWD	SCVWD



**Table 3-2 Mitigation Monitoring and Reporting Program Summary Table**

Environmental Resource Issue	Mitigation Measure #	Mitigation Measure	Timeframe for Implementation	Responsibility for Implementation	Responsibility for Oversight
Develop an Asbestos Dust Mitigation Plan if naturally-occurring asbestos is found.	HAZ-2h	<p>If naturally-occurring asbestos is found, the Contractor will stop work and SCVWD will develop an Asbestos Dust Mitigation Plan approved by Bay Area Air Quality Management District (BAAQMD) detailing measures to minimize emissions depending on the size of the disturbance and the source of the emission, which may include the following details:</p> <ul style="list-style-type: none"> <li>&gt; Methods for preventing emissions for crossing Project boundaries.</li> <li>&gt; Limiting vehicle speeds to 15 mph or less.</li> <li>&gt; Applying water prior to and during ground disturbance activities.</li> <li>&gt; Keeping storage piles wet or covered.</li> <li>&gt; Track-out prevention and removal.</li> <li>&gt; Implement dust control measures for specific emission sources.</li> <li>&gt; Notify BAAQMD prior to work beginning.</li> </ul>	Construction	SCVWD, Contractor	SCVWD
Evaluate impact of soil reuse on water quality and sensitive ecological receptors.	HAZ-2i	SCVWD will conduct a limited risk assessment to determine if site soil contaminants are likely to impact sensitive ecological receptors or impact water quality objectives established in the Basin Plan or if soil can be reused.	Pre-Construction	SCVWD	SCVWD
Develop an approved Mosquito and Vector Control Plan.	HAZ-7	<p>SCVWD will coordinate with Santa Clara County Vector Control District (SCCVCD) to develop a SCCVCD-approved mosquito and vector control plan, which will include:</p> <ul style="list-style-type: none"> <li>&gt; Identifying areas where mosquito larvae are likely to be present onsite.</li> <li>&gt; Specifying mosquito management methods (i.e., chemical, biological, excess water control).</li> </ul>	Pre-Construction	SCVWD	SCCVCD
<b>Cumulative Impacts</b>					
Limit utility disruptions.	4.3	If the City of Morgan Hill's sewer and stormwater upgrades overlap the Project schedule, SCVWD will coordinate the utility relocation to coincide in order to minimize the disruption of utilities.	Construction	SCVWD	SCVWD

Final EIR  
Upper Llagas Creek Project

ATTACHMENT

A

PUBLIC MEETING TRANSCRIPT





1  
2 UPPER LLAGAS CREEK FLOOD PROTECTION PROJECT  
3 DRAFT ENVIRONMENTAL IMPACT REPORT  
4 COMMUNITY MEETING  
5  
6  
7  
8  
9

10 January 15, 2014

11 6:36 P.M. - 8:04 P.M.  
12  
13

14 Morgan Hill Community and Cultural Center  
15 El Toro Room  
16 17000 Monterey Road  
17 Morgan Hill, California  
18  
19  
20  
21  
22  
23

24 REPORTED BY  
25 LEILA S. STRAND, C.S.R.  
LICENSE NO. CSR-2098

A P P E A R A N C E S

SANTA CLARA VALLEY WATER DISTRICT

Director Dennis Kennedy

Karen Akiyama

Norma Camacho

Stephen Ferranti, P.E.

Sunshine Julian, P.E.

Liang Lee, P.E.

Michael Martin

Monica Mendez

Melissa Moore

Ed Morales

Thu Nguyen

Sophia Valencia

CARDNO ENTRIX

Mitchell Katzel

Christie Robinson

Leila S. Strand, C.S.R.

RMC WATER AND ENVIRONMENT

Steve Bui

SUPPORT STAFF

MEMBERS OF THE PUBLIC

\* \* \*

PROCEEDINGS

Opening statement by Stephen Ferrante

Comments by Director Kennedy

Presentation by Stephen Ferrante

(Background and objectives of project)

Presentation by Sunshine Julian

(Staff introductions)

(PowerPoint)

Presentation by Michael Martin

Questions from the Audience

Conclusion of Community Meeting



1 MR. MARTIN: ....And with that, we'll open up  
2 to any comments or questions.

3 MR. FERRANTI: There's got to be some. It's a  
4 13-mile project.

5 AUDIENCE MEMBER: (Tom Glavinos) My name is  
6 Tom Glavinos. That's G-l-a-v-i-n-o-s.

7 My question is regarding the tunnels. Are  
8 there any other tunnels like this in Santa Clara  
9 County?

10 MR. FERRANTI: Well, I'm just trying to think  
11 here. I mean, our San Felipe project, it goes  
12 through -- from San Luis Reservoir, there's a tunnel  
13 there that the Bureau of Reclamation made -- built in  
14 '87. '87 that project was finished. There's a  
15 tunnel -- it's on 152, also by Casa de Fruta. There's  
16 a tunnel that goes through -- again, the San Felipe  
17 project. It goes through the mountain there and comes  
18 out just on the turnout by -- where you go to go the  
19 back way into Hollister by Four Corners. There's a  
20 tunnel there. But as far as in -- in Gilroy or -- or  
21 in this area, no, I don't believe so.

22 But, as I said, our water supply from San  
23 Felipe project, which goes into Anderson Reservoir,  
24 there is two tunnels associated with that project.

25 MS. JULIAN: We recently completed, maybe a

1    few years ago, the Lenahan -- Lenahan Dam Project where  
2    there is a tunnel that went through to that -- that  
3    lets out into Lexington.

4            MR. FERRANTI:    Any others?

5            Dale.

6            AUDIENCE MEMBER:    (Dale Jelsema)    Hi, Steve.

7            MR. FERRANTI:    We've met.

8            AUDIENCE MEMBER:    (Dale Jelsema)    You're doing  
9    a good job.

10           My question is:    I'm down on Reach 4 --

11           MR. FERRANTI:    Well, we should probably spell  
12    your last name.

13           THE WITNESS:    Sure; J-e-l-s-e-m-a.

14           My question is, basically on Reach 4, which  
15    isn't going to have much improvement, which we  
16    understand that, because it's all a rural area.    It has  
17    to do with that thing of noise.    And you mentioned on  
18    trails.    Okay?    I am concerned that these maintenance  
19    roads will not be used for either bicycles' access or  
20    motorcycles or ATVs or such.    Steve is aware; we've  
21    talked on it.    But I just -- when you mentioned that  
22    there was trails, I'm assuming those are mainly up in  
23    the Morgan Hill area and that those will not extend  
24    down to, let's say, the rural -- down to San Martin or  
25    south of San Martin area.

1           MR. FERRANTI: Yeah, that's correct. When we  
2 were talking about trails -- Michael was talking about  
3 trails, there's some existing trails in urban Morgan  
4 Hill down that way. Those, like I said, will be  
5 temporarily removed or removed for construction, and  
6 then it's up to the City to --

7           AUDIENCE MEMBER: (Dale Jelsema) Whether  
8 they're going to --

9           MR. FERRANTI: -- put them back or not.  
10           Now, I should point out -- you know, give you  
11 one other -- one other thing.

12           Lower Llagas, which is downstream of Buena  
13 Vista, all the way down to the (inaudible ) road --  
14 there again, Bloomfield Road we have way down there.  
15 That was built in the '80s and '70s -- '80s and early  
16 '90s, that project. This is basically the precedent to  
17 this project. It got changed. No funding, whatever.  
18 That portion of the project, farmers came to our board,  
19 I think it was 1992 -- somewhere in the '90s -- and  
20 they were complaining about that they didn't want that  
21 turned into trails, because the Farmers, you know,  
22 people, they didn't want trespassers, they didn't want  
23 their crops being stolen and ripped off, and people  
24 driving on those trails.

25           So, actually, there is a Board resolution for



1 the lower project that it can't be converted to --  
2 there's -- there's no trails. The Board basically says  
3 no trails.

4 Now, it doesn't mean that the City of Gilroy  
5 can't come to the Board and change their opinion ten  
6 years from now or something, but that -- that's what's  
7 happened in the south county. We don't have any plans.  
8 The District, as Mike said, we don't build trails; we  
9 build maintenance roads. We build channels to  
10 protect -- provide flood protection.

11 Now, like I said, in Reach 7 and 8 and urban  
12 Morgan Hill, the City may come -- the County is looking  
13 at different things. It would come to our Board.  
14 They'd have to prepare an environmental document just  
15 as -- just like this, because our environmental  
16 document doesn't cover the trails. So it would have to  
17 go through the same process and analyze impacts. Then  
18 our Board would have to, you know, basically approve  
19 that whole process, too. So it's -- it's not something  
20 that happens overnight. People get input to it. So  
21 we're not planning -- no trails in the South County, no  
22 trails as part of this project.

23 AUDIENCE MEMBER: (Dale Jelsema) And then one  
24 -- one other final question on Reach 4: Is that new --  
25 I'm going to call it an island; it's where that new

1    eversion channel is going to be created right by, you  
2    know, my area, et cetera. Is that going to be planted  
3    with, like, vegetation for mitigation of the trees you  
4    are taking out upstream? Are you going to be  
5    replanting new stuff there?

6           MR. FERRANTI: Yeah. Own stock in nurseries  
7    around here; it's a good idea, because we're  
8    planting -- we're planting everything that you can  
9    possibly imagine. Thousands of trees we're planting,  
10   but then --

11           AUDIENCE MEMBER: (Dale Jelsema) Then along  
12   that line: On those trees that are going into that,  
13   like, new island that's created, how are those going to  
14   be watered or maintained or....

15           MR. FERRANTI: Well, that's what Michael --  
16   Michael said. Really, we have limitations with the  
17   groundwater, especially down in Reach 4, and some of  
18   the issues are using plants -- using plants that don't  
19   need as much water. That's why the Sycamores, as  
20   Michael showed in Reach 3 to 7, by Lake Silveira,  
21   there's -- there's a lot of groundwater in that area,  
22   so the Sycamores are going to do better.

23           So you're not going to see Sycamores planted  
24   in high density in Reach 4, because it just -- because  
25   the soil conditioning and availability to water doesn't

1     exist.  So there's been all kinds of soil analysis done  
2     on what type of plants would work best in that kind of  
3     soil.  We try to maximize the revegetation based on the  
4     soil characteristics.

5             AUDIENCE MEMBER:  (Dale Jelsema)  All right.

6             MR. FERRANTI:  Go ahead.

7             AUDIENCE MEMBER:  (Virginia Anacleto)  Hi.  My  
8     name is Virginia Anacleto, and we're down Reach 4,  
9     also.

10            Talking about the trails -- those maintenance  
11   roads, are they going to be gated to prevent  
12   motorcycles and cars from using the maintenance roads?

13            MR. FERRANTI:  Yeah, they will be gated at  
14   streets, but you know how it's all open now.  I live  
15   down there, too, so --

16            AUDIENCE MEMBER:  (Virginia Anacleto)  Yeah.

17            MR. FERRANTI:  -- it's open.

18            We know that the horses go down the creek now,  
19   and so, yeah, we're going to do -- we're going to do  
20   everything we can to stop them from entering off of a  
21   main street, but, you know, it's not to say they  
22   won't trespass on other people's property or go into  
23   the creek and come up a bank.  There's only so much we  
24   can do.  But we're not going to invite them.

25            AUDIENCE MEMBER:  (Virginia Anacleto)  So it's



1 not like a car would easily enter the maintenance road?

2 MR. FERRANTI: No. They'd have to trespass.

3 AUDIENCE MEMBER: (Virginia Anacleto) Okay.

4 Fine.

5 MR. FERRANTI: State your name, please.

6 AUDIENCE MEMBER: (Eufemia Anacleto) My name  
7 is Eufemia Anacleto. We're related (indicating).

8 Is there -- when you're designing a project  
9 and acquiring the land on the creek side, is there  
10 anyone that we can go to to ask them to kind of revise  
11 it, because some -- they sent out a few articles about  
12 the land acquisition. And on our parcel, they wanted  
13 to get more, and that's going to cut into our privacy,  
14 so that is there a way for us to go to someone in the  
15 designing mode so that we could work on that?

16 MR. FERRANTI: Well, you know, we've got two  
17 public outreach meetings for those properties, and those  
18 letters came from me, so you would talk to me. I'll  
19 give you my card; you can contact me. We have, as  
20 Mr. Jelsema -- one of the conversations I had with  
21 Mr. Jelsema is to try to -- he had some concerns about  
22 things on his property and his neighbor's property,  
23 too, so we try to work around --

24 AUDIENCE MEMBER: (Eufemia Anacleto) Yeah.

25 MR. FERRANTI: -- and just make minor tweaks.

1 We can't, you know, redesign the whole project.

2 AUDIENCE MEMBER: (Eufemia Anacleto) No, no,  
3 no.

4 MR. FERRANTI: I know, but minor tweaks here  
5 and there --

6 AUDIENCE MEMBER: (Eufemia Anacleto) Yeah.

7 MR. FERRANTI: -- we've done.

8 And just to let you know, a lot of this was  
9 decided from -- as Michael said, to lessen the impact.  
10 So if there's Sycamores and heritage trees on one bank,  
11 we can't touch those. If there's Eucalyptus on the  
12 other bank, well, resource agencies -- environmental  
13 people don't really care about Eucalyptus, and they'd  
14 rather see the Eucalyptus go than the Sycamore. So  
15 it's kind of been told to us what side of the bank  
16 that, you know, you need to -- you need to widen on.

17 So, with that said, yeah, we can look at  
18 little tweaks here and there to try to minimize impact.

19 AUDIENCE MEMBER: (Eufemia Anacleto) And  
20 that's you?

21 MR. FERRANTI: I'll give you my card. That's  
22 me.

23 AUDIENCE MEMBER: (Eufemia Anacleto) Okay.

24 And, also, they sent out these -- the person  
25 -- the people that are going to survey -- what do you

1 call it? -- title company? They want our right of way.  
2 With the last meeting you went to, about three or four  
3 people asked you that were you going to go through our  
4 properties. And they -- we were told that no, because  
5 you're going to impact the -- the creek widening --  
6 creek widening, and not going through our property.

7 MR. FERRANTI: I think what -- are you talking  
8 about the right of entries? On the package we got, we  
9 got a right of entry. We just can't walk onto your  
10 land if we don't have rights. The Water District  
11 can't.

12 AUDIENCE MEMBER: (Eufemia Anacleto) So what  
13 does that entail, coming through the property or  
14 walking -- working along the creek? Is that the right  
15 of way that you are talking about?

16 MR. FERRANTI: Well, I'd have to sit down and  
17 figure it out. We can talk after the meeting. I can  
18 set up a meeting and come to your property. I've been  
19 to Mr. Jelsema's property a couple of times, been to  
20 his neighbor's a couple of times. I can come and visit  
21 you and we can go over, you know, where the line is.

22 We have also staked right of way for  
23 Mr. Joclyn (phonetic), Mr. Jelsema's neighbor, because  
24 he wanted to know -- he had a concern about a back  
25 door. He had a wall, like a masonry wall, around



1 his -- his back yard and he wanted to see where the  
2 right of way was in relationship to that wall. So we  
3 staked it for him. So we do that, and we look at it.  
4 And we actually modified it a little bit to give him a  
5 little more room, so....

6 AUDIENCE MEMBER: (Eufemia Anacleto) All  
7 right.

8 AUDIENCE MEMBER: (Amy Laurence) Hi. My name  
9 is Amy Laurence, L-a-u-r-e-n-c-e.

10 I'm in Reach 6, and I've got one of those  
11 trees.

12 MR. FERRANTI: The heritage trees?

13 AUDIENCE MEMBER: (Amy Laurence) Yes, sir.

14 But I have an interesting situation, because  
15 you -- you already have the piece behind me. The Santa  
16 Clara County [sic] Water District already owns what it  
17 is. And that tree bridges the two pieces. It's a big  
18 tree. It's one of the biggest ones between -- oh,  
19 well, it's -- it's very unique on the parcel map.

20 MR. FERRANTI: So you're off of San Martin  
21 Avenue --

22 AUDIENCE MEMBER: (Amy Laurence) Yes, sir.

23 MR. FERRANTI: -- and Llagas Road maybe?

24 AUDIENCE MEMBER: (Amy Laurence) Yes, sir.

25 MR. FERRANTI: Okay. I --

1           AUDIENCE MEMBER: (Amy Laurence) So I have  
2 this very, very interesting tree that you guys have had  
3 for a long time, and there is something already near;  
4 the tree has grown around it. And so in -- in my  
5 particular area of the creek, I do see a lot of  
6 animals -- I have all those Sycamores, and that -- and  
7 because I back the airport, it's -- there's one --  
8 there's noise from the airport, but there's also  
9 eyesores and things like that, so when you start  
10 cutting those big tree lines, now all of a sudden, I'm  
11 looking at 101. I'm looking at 101, and all of these  
12 things. And yet these trees -- when you are talking  
13 about removing 12 acres and then replanting them in one  
14 particular area --

15           MR. FERRANTI: No, no.

16           AUDIENCE MEMBER: (Amy Laurence) -- I mean --

17           MR. FERRANTI: We're -- we're planting --

18           AUDIENCE MEMBER: (Amy Laurence) There's a  
19 portion of trees that are being removed and then being  
20 replaced on Lake Silveira.

21           MR. FERRANTI: I'll just give you an idea.  
22 The Sycamore ratio is ten to one, so every Sycamore we  
23 take out, I think it's ten -- is that correct -- or 12.

24           MS. MOORE: The entire Reach 6, there is  
25 over -- it's what, 8 acres in Reach 6 that we're

1 replacing the Sycamores. Sycamores actually grow very  
2 well in that particular reach.

3 AUDIENCE MEMBER: (Amy Laurence) Yeah, yeah.

4 MS. MOORE: And so we are actually doing quite  
5 a lot of Sycamore replacement --

6 AUDIENCE MEMBER: (Amy Laurence) When that --

7 MS. MOORE: -- in that particular reach alone.

8 AUDIENCE MEMBER: (Amy Laurence) If that  
9 makes it possible --

10 MS. MOORE: It's --

11 MR. FERRANTI: Yeah. We just --

12 AUDIENCE MEMBER: (Amy Laurence) If you are  
13 thinking about cutting it down, I'd like you to look at  
14 this tree --

15 MR. FERRANTI: Yeah. We can --

16 AUDIENCE MEMBER: (Amy Laurence) -- because  
17 it's one of the largest trees along that side. And I  
18 don't know which side of the bank you're working on,  
19 because I don't know your design.

20 MR. FERRANTI: Okay. So just to give you an  
21 idea, we actually -- we actually did three separate  
22 Sycamore surveys along the whole 13 --

23 AUDIENCE MEMBER: (Amy Laurence) You know my  
24 tree.

25 MR. FERRANTI: -- and each time was -- the



1 first time was basically to get an idea where all the  
2 heritage Sycamores were.

3 The second time was to really figure out  
4 whether we can avoid them or not.

5 And the third time was to see whether they  
6 were actually natural trees or not London Plane, which  
7 is like a hybrid of the -- of a true Sycamore. So we  
8 actually looked at the genetics of the tree. So that  
9 was the third time we went through to actually figure  
10 out.

11 So you can just -- so we are very sensitive to  
12 Sycamores.

13 AUDIENCE MEMBER: (Amy Laurence) And you can  
14 take out all that blackberry, please --

15 MR. FERRANTI: Yeah. And that's one of the  
16 things --

17 AUDIENCE MEMBER: (Amy Laurence) -- and all  
18 that -- all that tall grass, because those trees --  
19 because it's just not the trees; it's also the -- how  
20 are you going to mitigate my view?

21 MR. FERRANTI: Right. And that's -- you know,  
22 our environmental people are taking this comment down,  
23 because that's one of the, you know, assessments we  
24 make in this document, is visual.

25 AUDIENCE MEMBER: (Amy Laurence) Yeah. Part

1 of the reason I live where I live is so I don't have to  
2 look at a freeway.

3 MR. FERRANTI: Okay. No. I understand. So I  
4 can give you my card; we can --

5 AUDIENCE MEMBER: (Amy Laurence) I appreciate  
6 that.

7 MR. FERRANTI: We can take a look at that  
8 Sycamore, see your Sycamore, and actually tell you  
9 if --

10 AUDIENCE MEMBER: (Amy Laurence) Well,  
11 technically, it's our Sycamore.

12 MR. FERRANTI: Okay. All right.

13 AUDIENCE MEMBER: (Amy Laurence) Thank you.

14 AUDIENCE MEMBER: (Connie Maceas) My name is  
15 Connie Maceas, and I'm in Reach 6.

16 Mind if I -- could you talk a little bit about  
17 the acquisition process.

18 MR. FERRANTI: Yeah.

19 Most of you have come to the meetings. We had  
20 two meetings. The first phase was the District kind of  
21 gave you -- we didn't really go over the first phase.

22 The first phase of construction is Reach 4,  
23 right here (indicating). Then Reach 7A. And then Lake  
24 Silveira, the mitigation. (Indicating).

25 So we are trying to acquire all of those

1 properties by June of this year. So it's very, very  
2 quick. It's about 40 parcels identified. And then the  
3 rest of the project has about 106 parcels to acquire.  
4 We want to acquire those by June 2015.

5 So our Board of Directors approved -- because  
6 we just have, you know, not the staff to acquire 140  
7 properties over an 18-month period. There's just no  
8 way. All the appraisals that have to occur, all the  
9 negotiations, all the right of entries. So our Board  
10 of Directors approved a consultant contract to -- for  
11 real estate services. It's OPC, Overland Pacific. And  
12 they most probably -- I was told that Mr. Jelsema got  
13 contacted by them several times. So they -- yeah,  
14 they're making their rounds and trying to get --  
15 especially if you are in Reach 4, you're going to be  
16 contacted. I'd be surprised if you haven't already  
17 been contacted.

18 But going back to your question: The process.  
19 The first thing to do is -- what we do is we send out a  
20 notification giving you an exhibit, kind of a little --  
21 a little kind of an idea of where the project limits  
22 are. I know it's just an exhibit.

23 The next step is to prepare a plats and  
24 descriptions. A plat and description is actually a  
25 metes and bounds. That's a legal document that shows



1     varying distance based on the recorded deed on the  
2     property. So it will just define a small portion or  
3     whatever portion that the District is interested in  
4     acquiring. That description and legal plat goes to the  
5     appraiser.

6             One of the right of entries we talked about  
7     earlier. The right of entry allows for an  
8     environmental assessment on all properties. We have to  
9     have somebody go out there and they -- what they look  
10    for is they'll come out there and look for a 55-gallon  
11    drum leaking PCBs; right. Because as a public agency,  
12    we can't spend public dollars on a property that we  
13    know is going to spend millions of dollars to clean it  
14    up. So we do what's called a Phase I. They just go  
15    and do a site inspection. They don't take -- they  
16    don't touch the ground or don't do anything like that.  
17    That's Phase I. And there's also a State register that  
18    they go to that has all the sites that have been --  
19    where contaminants have been and such. So they do that  
20    research online through the State. And then they go  
21    and do a site inspection and just say, "Okay, well,  
22    it's just farm land, or "it's rural," or whatever.

23             If they do find something, there's several --  
24    there's several industrial companies along there; it's  
25    commercial -- we actually may go to the next phase,

1    which is Phase II, where the company allows us -- you  
2    know, they give us the right of entry to go on and  
3    actually do soil sampling, groundwater testing, and  
4    things like that to get a Phase II site assessment.

5               When we have that information and we have the  
6    plat and description, then you will be contacted for an  
7    appraisal. An appraiser will show up at your property,  
8    if you've signed the right of entry -- and I always  
9    tell people to talk to the appraiser, tell them -- if  
10   you have somebody in the real estate business,  
11   find comps that you like, comparable sales. It  
12   doesn't matter to the District. It's an independent  
13   appraisal. You should -- you should try to tell them,  
14   "This is my grandfather's property; it's dear to me.  
15   You know, it's worth millions. And here's the -- and  
16   here's the -- you know, here's my neighbor that sold it  
17   two years ago for a million dollars. I think I should  
18   get, you know, two." It doesn't hurt. You know, it's  
19   your property, you know. And so tell that appraiser  
20   what it's worth.

21              And then what he'll do is he'll take four to  
22    six weeks, and he'll look at different comparable  
23    sales, right, and he'll put together a real thick  
24    volume.

25              And if you have a structure on there -- say,

1   it's a shed or you have a well that needs to be  
2   relocated, that has value, he'll put a value on that,  
3   if it has to be relocated. There's a value to having  
4   to replace it. So that all goes into the appraisal.

5           When the appraisal comes back to the Water  
6   District, all we do is look for accuracy. Does it  
7   match the area that the District wants to acquire; does  
8   it take into account the well; does it take into  
9   account, whatever, an outbuilding that is there that  
10   has to be removed? So we look at that. It usually  
11   takes a few days to review it.

12           Then a letter will go to the property owner  
13   with an offer. It will just -- it will be -- you get  
14   your appraisal and then you'll get the offer. And the  
15   offer will be matched in the appraisal.

16           So the property owner basically has a couple  
17   choices. They could say, "Hey, that's great. It's  
18   more than I thought it was worth," or say, "No; it's  
19   worth more than that." If you feel that way, then you  
20   can get your own appraisal. There's a list. It has --  
21   they have to be licensed. They can't be your  
22   brother-in-law that appraises the property; it has to  
23   be someone licensed with the State.

24           You can get your own appraisal and the  
25   District will reimburse you up to \$5,000. That should



1 cover most appraisals. The good thing about that --  
2 this reimbursement, is that if your appraisal comes in  
3 higher, great, submit it to the District. "This is  
4 what I want, right; it's a higher number." If it comes  
5 in lower, I would just turn in my receipts and say,  
6 "District, you know, I can't find my appraisal." You  
7 don't have to turn it in. It's going to hurt you if  
8 it's lower. And, you know, if the District's appraisal  
9 is for 200,000 and the other appraisal comes in at 150  
10 or 175,000, I would just keep the appraisal, throw in  
11 the receipts, and say, well, it's either I accept the  
12 District's offer or we go through the other route, you  
13 know, which is nothing that the District wants to do,  
14 which is that eminent domain stuff. We don't want  
15 that. We try to work things out. But that's the --  
16 that's kind of the approach.

17 So, hopefully, like I said, you get that  
18 appraisal value way up, and, you know, it's a win-win  
19 situation: You're happy with the price and we have --  
20 the District -- you know, we have a document that  
21 supports that.

22 As a public agency, we can't just -- that's  
23 the problem with a lot of appraisals. "You know, the  
24 appraised value is 150, give me 300,000, and I'm good."  
25 Well, can you imagine? I'd be in prison. People say,

1 "Hey, wait a minute; these are public dollars. You're  
2 giving my neighbor \$50,000 just because you like him,  
3 or something." We have to have a document that  
4 supports, as a public agency -- that supports the value  
5 of that property. So it doesn't matter how I feel  
6 about you or Mr. Jelsema or whatever. It's -- it has  
7 to be documented in a document. And if that document  
8 doesn't give you the number, then we got try to find  
9 another one that does. And that's the one that gets  
10 accepted. Hopefully, that's higher and it makes you  
11 happy. If not, then we have to go to the next step.

12 So that's the way it works.

13 AUDIENCE MEMBER: (Connie Maceas) Thank you.

14 MR. FERRANTI: We've got a lot of hands now.

15 AUDIENCE MEMBER: (Amy Laurence) A lot. Amy  
16 Laurence again. I apologize.

17 Did I hear that the creek was going to get cut  
18 off, as well, during the work?

19 MR. FERRANTI: What you heard -- what I think  
20 you heard is West Little Llagas comes right here  
21 (indicating), and everybody that has even lived  
22 anywhere around here knows that the first thing that  
23 goes is that flood right at the intersection of  
24 Monterey and Watsonville Road, because even though they  
25 replaced the culvert, it's still not big enough.

1           The reason for that is this really -- as we  
2 all know, this is really a small channel. I think it  
3 holds 80 CFS. Which somebody told me a long time ago,  
4 80 CFS is like 80 basketballs or something. But CFS is  
5 a cubic foot per second. A cubic foot is about the  
6 size of a basketball. So 80 CFS is 80 basketballs  
7 going down the creek every second. That's not a lot  
8 when you are talking about 3,000 or 3,500 CFS on the  
9 main stem. So this is really small.

10           So what happens is -- you see this Reach 7A,  
11 which is the first part of the Phase I construction,  
12 West Little Llagas comes here and then turns toward  
13 Monterey Road (indicating). Well, we're going to  
14 construct a new channel. And there's a portion of  
15 it -- it's already kind of been excavated behind the  
16 school. This gets excavated and what happens is now  
17 you have the main flows come here (indicating) instead  
18 of going to West Little Llagas. They're going to come  
19 down here and connect to the main stem of Llagas down  
20 here (indicating). This gets cut off, but this still  
21 gets all the local drainage (indicating).

22           And while he said -- I think Michael said  
23 there's less -- insignificant impact because right now  
24 when this floods or when this has high flows, it just  
25 goes out of bank anyway. You know, it spills out and



1     it's not in the channel.

2                 So post-project, yeah, there will be water  
3     here.  You'll still have water, and it just won't go  
4     out of the bank, right, so it's still going to get some  
5     local drainage, because everything drains this way.  It  
6     still gets local drainage, you know, and that's going  
7     to be a good amount, but it's not going to overflow the  
8     channel, whereas now it just goes in there and fills up  
9     and spreads out all over the farm land.

10                Did I explain that okay?  I think that's where  
11   Michael was talking about being cut off.

12                AUDIENCE MEMBER:  (Amy Laurence)  Thank you.

13                AUDIENCE MEMBER:  (Janet Tuttle)  I'm Janet  
14   Tuttle.

15                We live in Reach 8, and I am concerned about  
16   the wildlife in that area.

17                What is going to be done to prevent a deer  
18   from drowning or a child?  Is it going to be deep  
19   cement walls or is there going to be little ladders for  
20   someone to climb out if they fell in?

21                MR. FERRANTI:  In Reach 8, as Michael said, we  
22   are not touching the channel through downtown; we are  
23   doing the bypass or the tunnel option.  Now, the tunnel  
24   option, the inlet structure, which is right in this  
25   general area (indicating) --

1 AUDIENCE MEMBER: (Janet Tuttle) Yeah. North  
2 of Wright Avenue.

3 MR. FERRANTI: Yeah. Right across from Wright  
4 Avenue, there is a little -- there's a vacant lot; they  
5 just did curb and gutter there and stuff.

6 AUDIENCE MEMBER: (Janet Tuttle) Yeah.

7 AUDIENCE MEMBER: That's where the inlet  
8 structure is. So water will come from upstream, it  
9 will flow into a structure like a big box, but it'll  
10 be -- it'll be secured with -- it will be protected  
11 with fencing and things like that, so kids and stuff,  
12 wildlife can't get in.

13 But what happens is when the flow gets to a  
14 certain elevation, it'll spill into -- it'll go over a  
15 weir and go into the tunnel. Whereas if it stays low  
16 flow, it will just go down a pipe and go down into what  
17 we -- what we have existing in West Little Llagas now.  
18 So the only time West Little Llagas or -- gets that --  
19 gets -- the tunnel gets to flow is where the flow gets  
20 high enough where it then spills into the tunnel. So  
21 low flows still go into the main channel. If we have a  
22 storm tomorrow, it'd be -- it would just go down the  
23 natural channel just like post-project. It's just a  
24 peak flows when it comes down, instead of just -- we  
25 want to avoid flooding in downtown Morgan Hill -- it'll

1 go in the bypass tunnel.

2 AUDIENCE MEMBER: (Janet Tuttle) Thank you.

3 MR. FERRANTI: That's why that alternative.

4 That's why we didn't want to do the concrete, and  
5 that's why that one option, the NRCS option -- I think  
6 it was number two on the list --

7 AUDIENCE MEMBER: (Janet Tuttle) Uh-huh.

8 MR. FERRANTI: That's why that went away. The  
9 tunnel option was less impact, because that -- the  
10 natural channel in downtown Morgan Hill would have been  
11 concrete and vertical slopes, and you'd have had  
12 problems with animals getting trapped and things like  
13 that. It would have been very steep.

14 AUDIENCE MEMBER: (Laura Chanjaran) Hi. My  
15 name is Laura Chanjaran, and we live over, like, in the  
16 Paradise Park area.

17 I am just curious. I look at the map here.  
18 Is this channel going to go where you guys just  
19 recently built that black pathway and the bridge just  
20 south of Watsonville Road? There's, like, La Jolla, La  
21 Crosse, that kind of area, where West Little Llagas is,  
22 and then it crosses Watsonville.

23 MR. FERRANTI: Yeah. Are you talking about  
24 the pedestrian bridge there --

25 AUDIENCE MEMBER: (Laura Chanjaran) Yeah.



1           MR. FERRANTI:  -- that goes across West Little  
2 Llagas?

3           AUDIENCE MEMBER:  (Laura Chanjaran)  Is that  
4 where --

5           MR. FERRANTI:  That's where it gets cut off,  
6 West Little Llagas where I explained where that  
7 pedestrian bridge is.

8           AUDIENCE MEMBER:  (Laura Chanjaran)  Yes.  
9 That's where it gets caught -- gets cut off.

10          MR. FERRANTI:  Right, right.

11          AUDIENCE MEMBER:  (Laura Chanjaran)  And so  
12 where are you --

13          MR. FERRANTI:  Then all ahead stops.

14          AUDIENCE MEMBER:  (Laura Chanjaran)  The  
15 channel that heads stops.

16                So it's between the homes that are on -- I  
17 guess it would be like on the east side, and then  
18 there's home on the west side, as well.

19                So are you going to be working in that area,  
20 and then crossing by the mushroom factory?

21          MR. FERRANTI:  No.

22                Watsonville Road has a bridge there now.  It's  
23 just buried.  It gets right up to it, and it's just  
24 like a big -- it's just -- so Watsonville Road will be  
25 opened up with the first phase of construction.

1 AUDIENCE MEMBER: (Laura Chanjaran) Okay.

2 MR. FERRANTI: And then Middle Avenue is a  
3 bridge buried there for year and years. That gets  
4 opened up. This is -- this is -- so that channel --  
5 it's just that short section from Watsonville upstream  
6 to where West Little Llagas, that becomes a new  
7 channel. That's why it's been vacant, or just, you  
8 know, open space for so many years is because of this  
9 project.

10 AUDIENCE MEMBER: (Laura Chanjaran) Okay.

11 So are we still going to have access to the  
12 pathway back there? I mean, along the channel where  
13 you are going to be building it.

14 MR. FERRANTI: There'll be -- there'll be --  
15 as Michael said, there'll be a maintenance road put  
16 back in there with gravel. Now, the City will have to  
17 come back in and request a Joint Trails Agreement  
18 through our Board to repave it. They do plans to do  
19 that.

20 AUDIENCE MEMBER: (Laura Chanjaran) Okay.  
21 Because it's very popular.

22 MR. FERRANTI: Yes, it is.

23 AUDIENCE MEMBER: (Laura Chanjaran) And so  
24 my next question is: Lake Silveira, because that's  
25 also very popular. So is that another thing that the

1 City is going to have to come in and redo? Or it's  
2 just -- is that even annexed by the City? Is that even  
3 City property?

4 MR. FERRANTI: Good question.

5 County Parks owns that.

6 AUDIENCE MEMBER: (Laura Chanjaran) County  
7 Parks.

8 MR. FERRANTI: The City has an agreement that  
9 dates, I think, about 20 years, with them, or  
10 something. It's about using -- it's the kind of  
11 agreement with Parks that the City -- the County  
12 supports the City turning that into some kind of park  
13 element.

14 AUDIENCE MEMBER: (Laura Chanjaran) Okay. So  
15 that's good to hear, because, like I said, I know it's  
16 popular.

17 MR. FERRANTI: Well, what's going to happen,  
18 and we -- we realize what's going to happen. It's  
19 urban -- I'm from Gilroy, you know. And Uvas Trail,  
20 you can go out there any time of the day along Uvas and  
21 Christmas Hill Park, it's just -- it's just -- it's a  
22 freeway of people. I mean, people use it all the time.  
23 You can see what's going to happen. You have downtown  
24 people and they're going to go right down Reach 7A  
25 right to Lake Silveira. You are going to have, you



1 know, a maintenance road on both sides which people are  
2 going to walk. It's going to be gravel.

3 And County Parks -- the Water district is  
4 buying this 52-acre parcel at Lake Silveira from the  
5 County. We're discussing that right now. One of the  
6 things that we're doing is -- it's going to be a  
7 three-party agreement. The County doesn't want to sell  
8 it to the Water District without honoring their  
9 agreement that they had with the City of Morgan Hill.  
10 So we're doing that. I mean, we're going to take that  
11 commitment that the City of Morgan Hill and County  
12 Parks has, and we're just going to allow that to  
13 happen.

14 What the City of Morgan Hill does, what trails  
15 it does, we don't know at this point.

16 AUDIENCE MEMBER: (Laura Chanjara) All  
17 right.

18 MR. FERRANTI: But it looks like there's going  
19 to be some -- some trail eventually through there.

20 And maybe Director Kennedy, I know he's got --  
21 he's been talking to people that are really trail  
22 advocates in downtown Morgan Hill that are talking  
23 about this. He's had many discussions with them.

24 DIRECTOR KENNEDY: That will be a real asset.  
25 It will open up the trail all the way from downtown

1     Morgan Hill -- or at least from Dunne clear down to  
2     Silveira Lake. And Silveira Lake will become a  
3     wonderful asset for walkers, pedestrians, bicyclists to  
4     enjoy.

5             AUDIENCE MEMBER: (Laura Chanjara) Okay.  
6     Well, I think walkers, pedestrians, bicyclists already  
7     enjoy Silveira Lake. I know it will probably bring  
8     more people in.

9             But why is it necessary to convert it to a  
10    marshland?

11            MR. FERRANTI: It was identified in a  
12    Coordination Act Report, which was by U.S. Fish &  
13    Wildlife. It was prepared in 2000 as a major  
14    mitigation -- offsite mitigation for this project.

15            Because of all the impacts of the project,  
16    when we met with -- we had a public meeting last April  
17    with the residents along Lake Silveira, and they were  
18    actually very supportive of the plan. And then they  
19    reported to us that, you know, they see the lake as --  
20    you know, there's a lot of birds that fight over -- you  
21    know, when the lake drops down to level, there's little  
22    sand bars that form, and birds fight over the territory  
23    of just getting that -- being able to be on these  
24    little islands and stuff. So they were very happy  
25    about that.

1           And that's why we designed the lake so that  
2   open space was near the residents. And we're doing  
3   that, basically, not to give them open space, but to  
4   keep the critters away from the people and the people  
5   away from the critters. So that's why the critters and  
6   the marshland and the wetlands was identified as a  
7   component -- mitigation component. That's why we did  
8   that.

9           DIRECTOR KENNEDY: A lot of the lake will stay  
10   open as it is on, I guess, it would be on the south  
11   side. And it doesn't show up too well in the drawing.  
12   It shows up -- I was looking at that, you know, that  
13   sketch of Silveira Lake, because the drawing shows  
14   it -- the part where it's white is actually the open  
15   lake, and it's just the northern and northeastern part  
16   that will have the island habitat. So it will still be  
17   available.

18          MR. FERRANTI: The other issue with Lake  
19   Silveira right now: As we said, the flow goes into the  
20   lake. It was breached by the quarry owner back in the  
21   early '80s. So what happens is the water goes in here  
22   and just gets -- it just gets -- the water quality  
23   heats up and then what happens is it eventually goes  
24   back into the creek as warm, hot water that is not  
25   very -- the quality is very poor.



1           So the Resource Agency said, "We want to see  
2   the main stem, you know, the existing channel,  
3   re-established to help with the water quality, plus we  
4   want to have water go through this for the birds,  
5   critters, vegetation." And, you know, wetlands that  
6   they want to create.

7           Like I said, the residents are over here  
8   (indicating). We've moved everything away from them.

9           DIRECTOR KENNEDY: Let me just point out --  
10   I'd like to point out one thing. This (indicating) is  
11   open water. It doesn't look like it because it's  
12   white, but, you know, this all remains as open water,  
13   and this is more of the habitat (indicating).

14          AUDIENCE MEMBER: (Laura Chanjaran) So people  
15   will still have access to all of the land down there?

16          MR. FERRANTI: Yes.

17          Right now we're not touching -- right now,  
18   everything comes up off, you know, Monterey Road right  
19   here; you got the little thing and they walk. There's  
20   a sewer easement there. The City has it, you know, the  
21   sewer lines, the manholes. We're not touching that at  
22   all.

23          AUDIENCE MEMBER: (Laura Chanjaran) Okay.

24          MR. FERRANTI: The sewer has to remain. We're  
25   not touching the sewers.

1 AUDIENCE MEMBER: (Robert Cerruti) Hi. I am  
2 Bob Cerruti.

3 At previous meetings held here by the Water  
4 District for flood control, one of the issues was  
5 acquiring the parcels. You said it was taking some  
6 time to get them.

7 Can you tell us tonight: How many are left  
8 and how long do you think it will take to acquire those  
9 parcels?

10 MR. FERRANTI: Yeah. We have 146 parcels  
11 identified, and 40 of them are in the first phrase of  
12 construction, which we want to acquire by June of this  
13 year, June 2014.

14 AUDIENCE MEMBER: (Robert Cerruti) How many  
15 are left to acquire -- that you have ownership of?

16 MR. FERRANTI: We have ownership -- now, the  
17 Water -- I don't have any ownership of anything. The  
18 Water District has ownership of many -- we've been  
19 buying these parcels -- the Water District has been  
20 buying these parcels since the '60s, so there's  
21 hundreds and hundreds of parcels that the Water  
22 District owns along this creek --

23 AUDIENCE MEMBER: (Robert Cerruti) So that --

24 MR. FERRANTI: But what we have left -- but  
25 what we have left is about 146.

1 AUDIENCE MEMBER: (Robert Cerruti) To  
2 acquire?

3 MR. FERRANTI: To acquire.

4 AUDIENCE MEMBER: (Robert Cerruti) Okay.  
5 That's what I wanted to know.

6 MR. FERRANTI: We have to acquire 146, but we  
7 won -- the Water District owns a lot of the right of  
8 way already.

9 AUDIENCE MEMBER: (Robert Cerruti) All right.  
10 And what do you think that that would take to  
11 get those, another two or three years?

12 MR. FERRANTI: No. We just hired -- as I  
13 explained, we hired a consultant in October to help us  
14 with that. If we just had our -- our, you know, four  
15 or five real estate agents trying to acquire 146  
16 parcels, it would take a little more than two or three  
17 years. So we've hired a firm to actually help the  
18 Water District do all the appraisals, do all the plats  
19 and descriptions, to meet with the property owners to  
20 do all this work, to make offers.

21 And then eventually, it goes to our Board for  
22 approval. So there's -- we're trying to get all of  
23 these -- we're trying to get 146 by May of 2015. Okay?  
24 So about 18 months from now, we're going to have this  
25 whole project -- we want to have all the properties



1     acquired.   Okay?

2               Between now -- a subset of that is to get  
3     the first phase of construction done.   We want to  
4     acquire about 40 properties for the first phase of  
5     construction.   And that we want to do in the next six  
6     months.

7               So if you are in Reach 4 and you haven't been  
8     contacted, I want to know about it, because you should  
9     have been contacted.

10              AUDIENCE MEMBER:   (Robert Cerruti)   Okay.

11              My second question is:   Reach 14, the Little  
12     East Llagas Creek backs up to my property.   About two  
13     years ago, I sat down with Don Gage, who was Director  
14     of District 1, and members at the Water District's  
15     headquarters, and we talked about the horsemen riding  
16     horses back and forth up and down the creek bank.   And  
17     the hoofs of those horses are disrupting that bank.   I  
18     said, "What's going to happen is you're going to have a  
19     breakaway of the bank and then we're going to have a  
20     big expense."

21              So far, nothing to date has been done to stop  
22     that.   It continues to go on.   There are two access  
23     roads on either side of the creek that your truck  
24     drivers ride back and forth taking a peek at the creek  
25     here and there.   But other than that, I don't know what

1     you're going to do.

2                 Don Gage had mentioned maybe put a fence on  
3     one side to stop it.  Nothing has -- has been done and  
4     it continues.  And this is two years ago.

5                 MR. FERRANTI:  Yeah.  No; I was at one of the  
6     advisory committees; we brought this up with Don Gage  
7     about a year ago.

8                 It's really -- what we're planning to do in  
9     that -- in Reach 14 is widen -- widen it and plant it.  
10    So, hopefully, some of the vegetation that we plant in  
11    there will -- will, you know, deter some of the people  
12    from doing that.

13                I live right there, too, so I know the horses,  
14    they go right down San Martin Avenue; they walk right  
15    down the road.  You know, unfortunately, horses can get  
16    into the creek and they climb up the banks.  I don't  
17    know how we can, you know -- how we can stop that, per  
18    say, in a rural community.  There's people here  
19    probably -- I wouldn't want fences along -- along, you  
20    know, every stretch of the creek.  So you're going to  
21    have different opinions on whether they want fencing or  
22    just keep an open space.

23                AUDIENCE MEMBER:  (Robert Cerruti)  I would  
24    say if they're going to climb the creek, just take that  
25    money and put the fence up.  The creek doesn't have any

1 plants right now, just natural grass, and it holds  
2 itself in.

3 MR. FERRANTI: Yeah.

4 AUDIENCE MEMBER: (Robert Cerruti) If you're  
5 going to go in there and put -- spend all the tax  
6 dollars in putting these plants in, then the horsemen  
7 are going to go in there and start tearing the  
8 plants up.

9 MR. FERRANTI: Yeah. Well, we're going to  
10 have people on-site, which will be a lot more  
11 supervision than there is now. The plants -- I mean,  
12 we -- Reach 14 doesn't have very much vegetation, I  
13 agree with you. And the resource agencies agree with  
14 you. They want to see it planted. And if we're going  
15 to get this project permitted, Reach 14 is going to  
16 get -- Reach 14 is going to get planted. So -- because  
17 that's the only way we can mitigate for the impacts  
18 that we describe in the document.

19 So -- and I know you had conversation with  
20 Director Gage or ex-Director Gage -- Mayor Gage. And  
21 I'm sure Director Kennedy would talk to you about, you  
22 know, your concerns about fencing. But I know fencing  
23 in that area, they cut it. Unfortunately.

24 Yes?

25 AUDIENCE MEMBER: (Robert Redfern) My name is



1     Bob Redfern.

2                 Three or four times a week I ride the bike  
3     trail that runs from Watsonville Road all the way up to  
4     Spring Street with just a little gap in it.  You're  
5     going -- I just wanted to clarify the lady's question  
6     behind me.  You are going to tear out that entire piece  
7     while you are doing this construction?

8                 MR. FERRANTI:  Not all the way to Spring  
9     Street, I don't think.  But probably a good stretch of  
10    that will be -- will be impacted from this project.  
11    And instead of having an asphalt road or asphalt trail,  
12    you will have a rock -- a gravel road.

13                Now, the City has the option to come back in  
14    and pave it.  So -- and there's been lots of  
15    discussions with our Board about doing just that, but  
16    it won't be part of this project.  So there may be a  
17    little -- there may be a lag period between the time  
18    you have gravel and the time you have asphalt, but it  
19    will still be a trail.

20                AUDIENCE MEMBER:  (Robert Redfern)  And this  
21    will be 2015, Lord willing and the creek don't rise.

22                AUDIENCE MEMBER:  (Unidentified)  We want the  
23    creek to rise right now.

24                DIRECTOR KENNEDY:  Well, we do, the Water  
25    District meets with the City on a regular basis, about

1 every three months. We give a status report to the  
2 City Manager, to the Mayor. And I know the City values  
3 that trail you are talking about. I pretty much use it  
4 myself. But as Steve had mentioned, during and before  
5 construction, we'll have to -- that will have to be  
6 disrupted, but we'll have to -- the Water District will  
7 have to work with the City to make sure we do something  
8 with it. But we recognize the value and we'll try to  
9 accommodate the City's needs as much as possible.

10 MR. FERRANTI: Yeah. And I would suggest  
11 that, just jumping on in and adding to Director  
12 Kennedy, is the environmental document talks about the  
13 trail and how to mitigate for that, detours and things  
14 like that during construction. So I would pull up  
15 that, come to the website, the District website, and  
16 read about that and comment on it if you have any  
17 further questions about how the environmental document  
18 addresses it and like that.

19 AUDIENCE MEMBER: (Laura Chanjaran) I'm  
20 sorry. I do have another question.

21 MR. FERRANTI: No problem.

22 AUDIENCE MEMBER: (Laura Chanjaran) When are  
23 you going to be notifying the neighbors in that area of  
24 the construction? That is going to be next year or...?

25 MR. FERRANTI: Well, we're trying to acquire

1 the right of way by June of 2015 or May of 2015. When  
2 we can start construction is another matter. I didn't  
3 really get into the detail.

4 Director Kennedy said we have some money,  
5 funding for this. But one portion of the funding for  
6 this project is State subvention. I won't get too much  
7 into that, but when this project is a -- it's a State  
8 program where if -- if you have a Federal link to a  
9 project, you can get reimbursed for, for instance, land  
10 costs. So if we spend a million dollars on a couple of  
11 properties, we turn that claim into the State, and  
12 because this project is so grandfathered in, the  
13 reimbursement is 100 percent, so -- which is huge. Now  
14 it's 60, 70 percent. If you get 70 percent  
15 reimbursement from the State now, it's just a nice  
16 deal. But we -- this project has a hundred percent.

17 So when we buy these properties over the next  
18 18 months -- and one of the reasons is we want to get  
19 this project built; we want to get these right of ways,  
20 all this acquisition. And the other reason is we want  
21 to get -- we want to turn that money -- those claims  
22 in, get that money back. If we spend 30 million on  
23 real estate buying these 146 parcels, right, you are  
24 going to turn around -- we're going to submit those  
25 claims to the State, and get that -- try to get --

1 usually it's about a year or two turnaround, but we'll  
2 get that 30 million back and we can put it into  
3 construction. So it's kind of leveraging the money and  
4 getting -- double-using it; right.

5 So it's really important for us to acquire the  
6 right of way, make a claim to the State, get that money  
7 back, and use it back in the community, basically  
8 twice.

9 Does that make sense as far as that?

10 So I didn't really answer your question,  
11 but -- so we want to get everything acquired by 2015.  
12 So it's really going to depend when we get that money  
13 back from the State as to when this construction will  
14 occur. We're hoping summer of 2016, but, like I said,  
15 that's -- it may be summer of 2017 we actually do that.

16 But the good thing is our environmental  
17 document we've done will have the plans sitting on the  
18 shelf. And that's -- since 1954, that's never  
19 occurred. We're well -- we're well at the end of the  
20 tunnel, or the reach there. Light at the end of the  
21 tunnel.

22 DIRECTOR KENNEDY: It better not get dusty on  
23 the shelf.

24 MR. FERRANTI: No, no. I am leaving that up  
25 to the Director.



1           AUDIENCE MEMBER: (Humberto Torre) Humberto  
2 Torre out of Reach 4.

3           And I just have a question regarding our  
4 property lines off of Rucker adjacent to the bridge.  
5 And we just acquired the property; we just moved in.  
6 But our property actually crosses the creek. And is  
7 there -- like, who would we contact about seeing if we  
8 could get the property line actually staked out?

9           MR. FERRANTI: Me.

10          AUDIENCE MEMBER: (Humberto Torre) And  
11 another thing is we noticed that some of the trees  
12 close to the property and in our property are tagged.  
13 What are they tagged for, removal or --

14          MR. FERRANTI: Just identification.

15          AUDIENCE MEMBER: (Humberto Torre)  
16 Identification.

17          MS. MOORE: There are little metal tags?

18          AUDIENCE MEMBER: (Humberto Torre) Yes. We  
19 just weren't sure, because my grandfather has been  
20 asking why they're tagged.

21          MS. MOORE: We just want to account for the  
22 trees, and we identify them with the tags, and that's  
23 how we use it, to avoid the larger Sycamores, through  
24 design. You will see the little tags with the numbers,  
25 and we appreciate it if we can just leave them there.

1 It gets confusing when we start losing tags, but that's  
2 what they're used for.

3 MR. FERRANTI: I'll give you my card at the  
4 end of the meeting.

5 Any other questions? You guys warmed up real  
6 quick. You had a lot of questions. That's good.

7 So the next phase is, like I said,  
8 February 20th. Get your comments in. Like I said, the  
9 document is quite large. It's going to take more than  
10 a night of reading. It's quite a big document. So you  
11 probably want to take points of interest, like yours  
12 with trails. You should read that section and comment  
13 on it. But take your time. You've got to  
14 February 20th. You can go online or submit cards or  
15 mail into Michael on the package any comments,  
16 questions you have, and we'll get them addressed in the  
17 final document.

18 MR. MORALES: Ed Morales.

19 Also, this PowerPoint is also available on the  
20 website. There's a packet in your -- in your packet,  
21 there's a step-by-step process how to get into the  
22 Upper Llagas webpage if you want to see this  
23 PowerPoint. I just wanted to mention that to you.

24 MR. FERRANTI: Director Kennedy.

25 DIRECTOR KENNEDY: I want to thank you all for

1 coming. Good questions, good comments. I want to  
2 thank our staff. As you noticed, we have an excellent  
3 staff that really know their stuff, so feel free to  
4 either contact me or Stephen, any of our staff. I've  
5 got my cards here, as well. So thanks, again, for  
6 coming. And we're going to get this project done.  
7 That environmental Impact Assessment is not going to  
8 get dusty. Over my dead body.

9 Thank you all.

10 (WHEREUPON, at 8:04, the hearing was  
11 concluded.)  
12  
13  
14  
15  
16  
17  
18  
19  
20  
21  
22  
23  
24  
25

1 State of California )

2 County of Santa Clara )

3 CERTIFICATE

4 I, Leila S. Strand, a Certified Shorthand  
5 Reporter, License No. CSR-2098, hereby certify that the  
6 foregoing TRANSCRIPT OF PROCEEDINGS was taken at the  
7 time and place therein named; that the said TRANSCRIPT  
8 OF PROCEEDINGS was reported by me, a Certified  
9 Shorthand Reporter and a disinterested person, to the  
10 best of my ability, and was thereafter transcribed into  
11 typewriting under my direction and supervision.

12 IN WITNESS WHEREOF, I have hereunto set my hand.

13 Date: 01/20/14.

14

15

16 \_\_\_\_\_  
Leila S. Strand, C.S.R.

17 License No. CSR-2098

18

19

20

21

22

23

24

25



